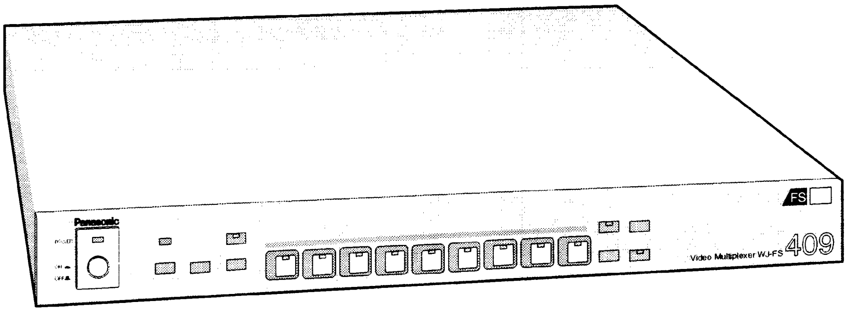
ORDER NO. AVS0105363A8

Service Manual

Video Multiplexer
WJ-FS409/WJ-FS416

Simplified



Please file and use this supplement service manual together with the service manual for Model No. WJ-FS109/ WJ-FS116 Order No. AVS9911207C8.

SPECIFICATIONS

Power Source :	220 V - 240 V AC 50 Hz
Power Consumption :	14 W
Camera Input (1-16)/(1-9)* :	1.0 V[p-p] /75 Ω 2:1 interlaced composite video signal
Playback Input :	1.0 V[p-p] /75 Ω composite video signal
Camera Switching Input :	1 RCA pin jack
Sampling Frequency :	4 fsc 17 MHz
Quantizing :	8 bit
Pixels :	720 x 544
Maximum Refreshing Rate :	4 fields/second
Camera Output (1-16)/(1-9)* :	Looped through Camera Input, 75 Ω automatic termination
Recording Output :	1.0 V[p-p]/75 Ω composite video signal, Multiplexed with Camera ID
Multiscreen Output :	1.0 V[p-p]/75 Ω composite video signal
Spot Output :	1.0 V[p-p]/75 Ω composite video signal
Data (Input/Output) :	Based on RS-485 (4-lines) Modular Jack x 1
Alarm/Remote Control :	25-pin D-sub Connector
Alarm Recover Input :	1 (0 V - 5 V DC)
Alarm Recover Output :	1 (0 V - 5 V DC)

Specifications marked with * apply to WJ-FS409.

Panasonic

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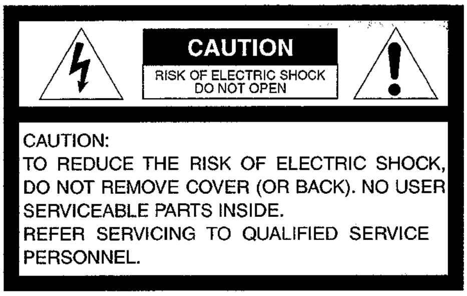
⚠ WARNING

This service information is designed for experienced repair technicians only and is not designed for use by the general public.

It does not contain warnings or cautions to advise non-technical individuals of potential dangers in attempting to service a product.

Products powered by electricity should be serviced or repaired only by experienced professional technicians. Any attempt to service or repair the product or products dealt with in this service information by anyone else could result in serious injury or death.



CAUTION:
TO REDUCE THE RISK OF ELECTRIC SHOCK, DO NOT REMOVE COVER (OR BACK). NO USER SERVICEABLE PARTS INSIDE.
REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.

This symbol warns the user that uninsulated voltage within the unit may have sufficient magnitude to cause electric shock. Therefore, it is dangerous to make any kind of contact with any inside part of this unit.

This symbol alerts the user that important literature concerning the operation and maintenance of this has been included. Therefore, it should be read carefully in order to avoid any problems.

IMPORTANT SAFETY NOTICE

There are special components used in this equipment which are important for safety. These parts are indicated by the "⚠" mark on the schematic diagram and the replacement parts list. It is essential that these critical parts should be replaced with manufacturer's specified parts to prevent X-radiation, shock, fire, or other hazards. Do not modify the original design without permission of manufacture.

Alarm Output : 1 (No Voltage Contact, O.C. [24 V DC, less than 100 mA])
Ambient Operating Temperature : –10°C - +50°C (14°F - 122°F)
Ambient Operating Humidity : Less than 90 %
Dimensions : 420 mm (W) x 44 mm (H) x 350 mm (D) [16-9/16" (W) x 1-3/4" (H) x 13-3/4" (D)]
Weight : 4 kg (8.8 lbs.)

Dimensions and weight are approximate.
Specifications are subject to change without notice.

STANDARD ACCESSORIES

Rack Mounting Bracket	2 pcs.
Screws (M3 x 10)	6 pcs.
Switch Protector	1 pc.

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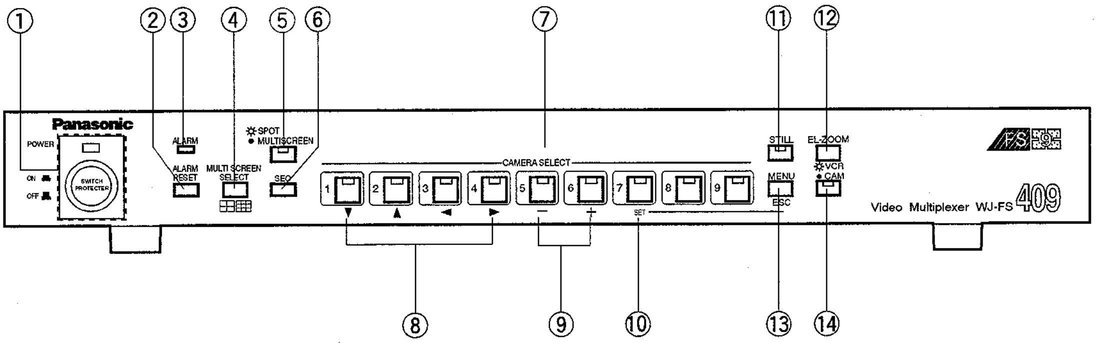
MAJOR OPERATING CONTROLS AND THEIR FUNCTIONS

■ Front View

<WJ-FS409>



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Panasonic
POWER
ON
OFF
SWITCH PROTECTER
ALARM
ALARM RESET
MULTI SCREEN SELECT
SPOT
MULTISCREEN
SEQ
CAMERA SELECT
1 2 3 4 5 6 7 8 9
▼ ▲ ◄ ►
− +
SET
STILL
MENU
ESC
EL-ZOOM
VCR
CAM
Video Multiplexer WJ-FS409
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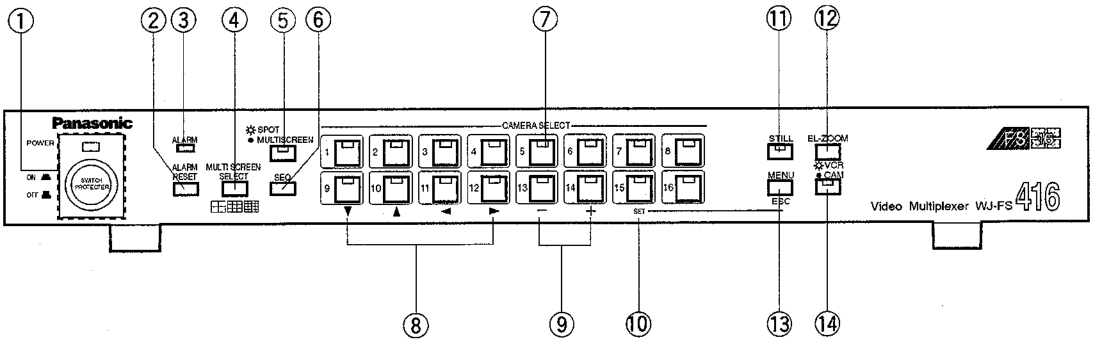
<WJ-FS416>



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− +
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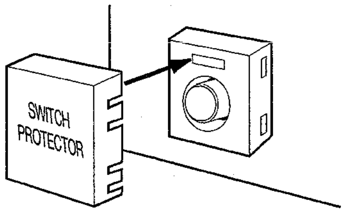
STILL
MENU
ESC
EL-ZOOM
VCR
CAM
Video Multiplexer WJ-FS416
⑧ ⑨ ⑩ ⑬ ⑭

① Power Switch (POWER ON/OFF)

This switch turns the power of the video multiplexer on or off. The LED lights up when the power is turned on.

Note: To prevent that the power of the video multiplexer is turned off accidentally, install the supplied switch protector as shown below.



SWITCH PROTECTOR

② Alarm Reset Button (ALARM RESET)

This button resets the active Alarm mode. Pressing this button turns off the Alarm indicator and replaces the "ALARM" indication on the monitor screen with the camera title.

③ Alarm Indicator (ALARM)

This indicator blinks when an alarm is activated. It changes to steady light when the auto-reset time has elapsed or the alarm recovery signal is received from the VTR. To turn the indicator off, press the **ALARM RESET** button.

④ Multiscreen Selection Button (MULTISCREEN SELECT)

This button selects the multiscreen pattern for the monitor. Multiscreen is available only MULTI OUTPUT mode. Pressing this button repeatedly switches patterns as follows:

Multiscreen Picture:

4→9→4 screen segments (WJ-FS409)
4→9→16→4 screen segments (WJ-FS416)

Note: When ON is selected for QUAD SHIFT on the MONITOR OUTPUT SETUP menu, the screen changes by pressing this button as follows:
4A→4B→9 screen segments (WJ-FS409)
4A→4B→4C→4D→9→16 screen segments (WJ-FS416)

The 4A screen is a compressed picture of channels 1 through 4, the 4B of channels 5 through 8, the 4C of channels 9 through 12, and the 4D of channels 13 through 16. The 9-segment screen shows the pictures of channels 1 through 9 in a 3x3 pattern.

Spot/Multiscreen Selection Button (SPOT/MULTISCREEN)

This button is used to select either the Spot output or Multiscreen output.

Sequence Button (SEQ)

This button activates the sequence mode. In this mode, a series of camera pictures is displayed in succession on the monitor screen for the specified duration.

Camera Selection Buttons (CAMERA SELECT)

These buttons select the camera for live picture or picture recorded on the tape. When the VTR is in playback mode and the LED on the **VTR/CAM** button is on, these buttons select the specified camera picture from the tape for display on the monitor. When the LED is off, the buttons select the live picture of the specified camera.

Cursor Buttons (▼, ▲, ◄, ►)

These buttons move the cursor in the SETUP menu of the Video Multiplexer, or select an area for Electronic Zooming.

▼: Downward
▲: Upward
◄: Left
►: Right

Increment/Decrement Buttons (–, +)

Electronic Zooming is operated with these buttons, Zoom In with the + button and Zoom Out with the – button. During the setup, these buttons are used to select parameters.

Set Button (SET)

This button executes the selected parameter in the setup menu, and opens a submenu for more detailed settings. Menu items having a submenu are identified by a return symbol at the end of the line.

Still Button (STILL)

This button selects either still or moving mode for display on the multiscreen output monitor. Pressing a **CAMERA SELECT** button will display the corresponding picture either in still or moving mode. When a still picture is displayed, the LED lights. Pressing the button again restores the moving picture and turns off the LED.

Note: Please note that the tape continues running while the picture is stilled. You may sometimes have to rewind the tape to the desired position.

⑫ Electric Zoom Button (EL-ZOOM)

This button specifies the zooming area in the multiscreen output picture. Pressing this button displays the "+" sign representing the centre of the area to be enlarged. While the "+" sign is displayed for 5 seconds, move the "+" sign with the cursor buttons to the desired position and press the Increment (+) button. The designated area is enlarged.

To return to the normal picture press the Decrement (–) or the **EL-ZOOM** button.

⑬ MENU/ESC Button (MENU/ESC)

Pressing this button for 2 seconds or more opens the Setup Menu of the Video Multiplexer. If pressed for less than 1 second, it functions as the Escape button and returns you to the previous menu.

To close the Setup menu when the setup is completed, press the button for 2 seconds.

Notes:

- Make sure to distinguish between 1-second and 2-second operation of this button.
- Opening the Setup menu does not affect the recording signal (REC OUT) output from the rear panel.

⑭ VTR/Camera Selection Button (VTR/CAM)

This button selects either VTR playback or the camera picture for display on the monitor. At the same time, it disables or enables recording on the VTR, since the connected VTR performs only playback or recording at a time. The playback picture is displayed on the monitor if you start playing back the VTR while the LED is on. The camera picture is displayed on the monitor while the LED is off. The camera picture is recorded on the tape if you start the VTR recording.

Notes:

- If PLAYBACK AUTO is set to ON in the setup, pressing this button is ignored, instead this button follows the VTR status automatically. VTR is selected while playing back, and CAM is selected during non-playback mode of the VTR.
- There may be a delay of a few seconds after switching this button between VTR and CAM when PLAYBACK AUTO is ON.

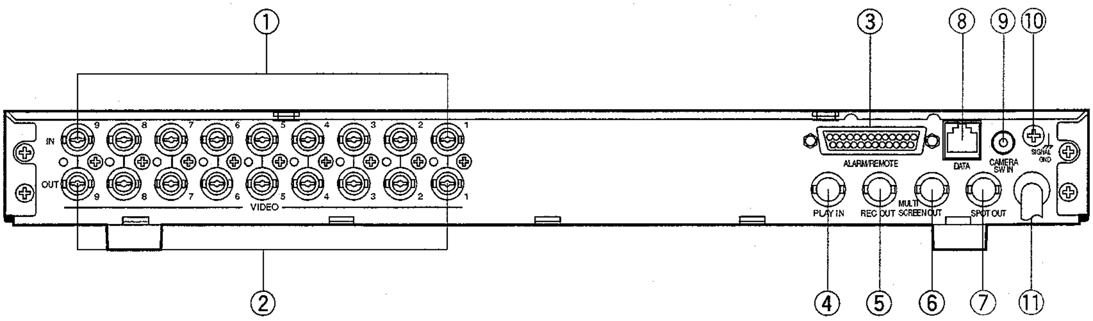
* The picture may be disturbed for a moment after switch between VTR and CAM.

- Blinking of the LED is a warning that the ID code is missing in the playback signal. This may happen when using certain VTR types. In this case, the playback picture goes straight to the monitor instead of through the Video Multiplexer. As a result, the playback picture will not be recognizable unless only a single channel is recorded throughout the tape.

Note: Do not press more than two buttons on the front panel simultaneously. This may cause malfunction.

■ Rear View

<WJ-FS409>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IN
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VIDEO
ALARM/REMOTE
DATA
CAMERA SW IN
SIGNAL GND
PLAY IN
REC OUT
MULTI SCREEN OUT
SPOT OUT
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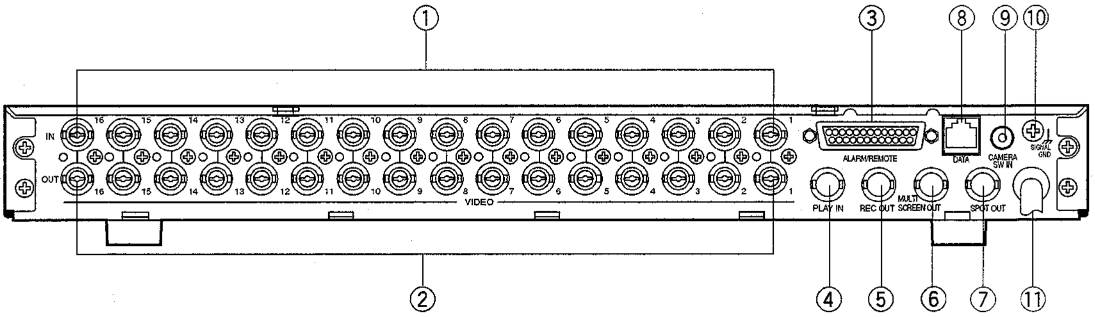
<WJ-FS416>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1
VIDEO
ALARM/REMOTE
DATA
CAMERA SW IN
SIGNAL GND
PLAY IN
REC OUT
MULTI SCREEN OUT
SPOT OUT
②
④
⑤
⑥
⑦
⑪

① **Video Input Connectors (VIDEO IN)**
These connectors accept a composite video signal from a camera.

Note: If the input signals have a high jitter content, as in the case of a VTR playback picture, it may not be possible to synchronize this unit.

② **Video Output Connectors (VIDEO OUT)**
The video signals connected to the Video Input Connectors (VIDEO IN) are looped through to these connectors with an automatic 75 Ω termination.

③ **Alarm/Remote Control Connector (ALARM/ REMOTE)**
This connector accepts the alarm signals from the associated alarm sensor units and the control signals from the external system.

④ **Playback Input Connector (PLAY IN)**
The playback signal from the time lapse VTR is supplied to this connector.

⑤ **Record Output Connector (REC OUT)**
The recording signal for the time lapse VTR is provided via this connector.

⑥ **Multiscreen Output Connector (MULTISCREEN OUT)**
The video output signal for the multiscreen monitor is provided via this connector.

⑦ **Spot Output Connector (SPOT OUT)**
Provides the video output signal for the spot monitor.

⑧ **Data Port (DATA)**
For exchange control data with the WV-CU360 System Control Unit or a PC within a system.

⑨ **Camera Switching Input Connector (CAMERA SW IN)**
The camera switching pulse from the time lapse VTR is supplied to this connector.
The camera switching interval (Sequential Dwell Time) can be synchronized with the time lapse mode set in the associated time lapse VTR.

⑩ **Signal Ground Terminal (SIGNAL GND)**

⑪ **Power Cord**

ADJUSTMENT PROCEDURE

1. Test Equipments Required

The following Test Equipments are required for adjustment of the Video Multiplexer WJ-FS409/WJ-FS416.

- Underscanned Colour Video Monitor
- Video Monitor
- Vectorscope
- Waveform Monitor
- Video Signal Generator
  - Colour Bar Signal
  - Ramp Signal (without Carrier)
- Digital Voltmeter
- Oscilloscope
- Frequency Counter
- Ceramic Screwdriver

2. Disassembling Procedure for Adjustment

- Referring to Fig. 2-1, remove eight screws that secure the Upper Cover and remove the Upper Cover.

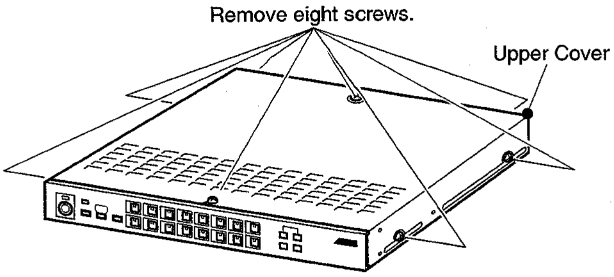

Remove eight screws.
Upper Cover

Fig. 2-1

3. Connection and Setting up for Adjustment

3.1. Connection

- Fig. 3-1 shows the connecting diagram for adjustment of the WJ-FS409/WJ-FS416.

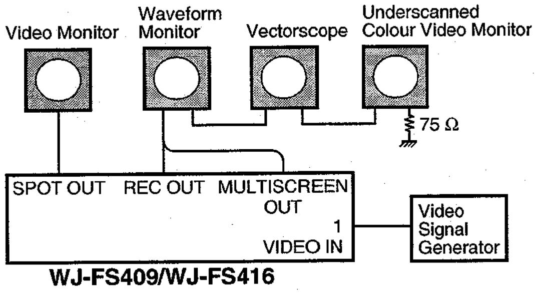

Video Monitor
Waveform Monitor
Vectorscope
Underscanned Colour Video Monitor
75 Ω
SPOT OUT
REC OUT
MULTISCREEN OUT
1
VIDEO IN
Video Signal Generator
WJ-FS409/WJ-FS416

Fig 3-1

- Connect the Underscanned Colour Video Monitor through the Vectorscope and the Waveform Monitor to the Record Output Connector or the Multiscreen Output Connector on the Rear Panel of the WJ-FS409/WJ-FS416.
- Connect the Video Monitor to the Spot Output Connector on the Rear Panel of the WJ-FS409/WJ-FS416.
- Terminate the input terminal of the Underscanned Colour Video Monitor with 75 Ω.
- Connect the Video Signal Generator to the Video Input Connector 1 on the Rear Panel of the WJ-FS409/WJ-FS416.
- Connect the probe of the Oscilloscope, the Digital Voltmeter or the Frequency Counter at the desired Test Point in each adjustment step.

3.2. Setting Up

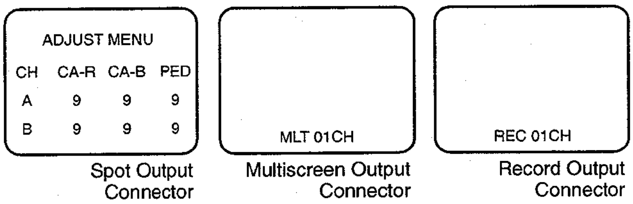
- This adjustment should be done after 10 minutes warm up of the WJ-FS409/WJ-FS416.

<Initial Setting>

- This Initial Setting should be done before adjustment as follows:
- Turn off the power.
- Turn on the power while pressing the Cursor Button (►), the Decrement Button (–) and the Menu Button (**MENU**) simultaneously until all LEDs on the Front Panel are lit, and all the Setting Conditions are initialized.
- Turn off the power.

<Adjustment Mode>

- All adjustments should be done in this Adjustment Mode as follows:
- Turn off the power.
- Turn on the power while pressing the Cursor Button (►), the Increment Button (+) and the Menu Button (**MENU**) simultaneously until all LEDs on the Front Panel are lit, then the Adjustment Menu appears on each Monitor Screen as shown in Fig. 3-2.



ADJUST MENU

CH	CA-R	CA-B	PED
A	9	9	9
B	9	9	9

MLT 01CH

REC 01CH

Spot Output Connector
Multiscreen Output Connector
Record Output Connector

Fig. 3-2

4. Adjustment Procedure

- Refer to the Location of Test Points and Adjusting Controls on the page 9 (for WJ-FS409) or page 10 (for WJ-FS416).

(1). Oscillator Output DC Level Adjustment (WJ-FS416 only)

Test Point:	**TP408 (OSC DC)**	**Main Board**
Adjust:	**VR400 (OSC DC)**	**Main Board**

- Disconnect all input signals from the WJ-FS416.
- Connect the Digital Voltmeter to TP408.
- Adjust VR400 to obtain 2.5 V ± 0.3 V DC.

(2). 13.5MHz Frequency Adjustment

Test Point:	**TP305 (13.5MHz) for WJ-FS409** **TP405 (13.5MHz) for WJ-FS416**	**Main Board**
Adjust:	**CT301 (13.5MHz) for WJ-FS409** **CT401 (13.5MHz) for WJ-FS416**	**Main Board**

- Disconnect all input signals from the WJ-FS409/WJ-FS416.

For WJ-FS409

- Connect the Frequency Counter to TP305 and TP803 (GND).
- Adjust CT301 to obtain 13.500 000 MHz ± 18 Hz.

For WJ-FS416

- Connect the Frequency Counter to TP405 and TP803 (GND).
- Adjust CT401 to obtain 13.500 000 MHz ± 18 Hz.

(3). G/L PLL DC Level Adjustment

Test Point:	**TP406 (MULTI G/L PLL DC)**	**Main Board**
	TP306 (REC G/L PLL DC)	**Main Board**
Adjust:	**L401 (MULTI G/L PLL DC)**	**Main Board**
	L303 (REC G/L PLL DC)	**Main Board**

- Supply the Ramp signal to the Video Input Connector 1.
- Connect the Digital Voltmeter to TP406.
- Turn L401 to fully clockwise direction.
- Adjust L401 to obtain 2.5 V ± 0.3 V DC.
- Connect the Oscilloscope to TP306.
- Turn L303 to fully clockwise direction.
- Adjust L303 to obtain 2.5 V ± 0.3 V DC.

(4). Multiscreen Output Level Adjustment

Test Point:	**Multiscreen Output Connector**	**Rear Panel**
Adjust:	**VR601 (MULTI BURST)**	**Main Board**
	VR602 (MULTI ID)	**Main Board**

- Disconnect all input signals from the WJ-FS409/WJ-FS416.
- Connect the terminated Oscilloscope with 75Ω to the Multiscreen Output Connector.
- Trigger the Oscilloscope with H rate.
- Adjust VR601 so that the Burst level becomes 0.3 V ± 0.03 V as shown in Fig. 4-1.

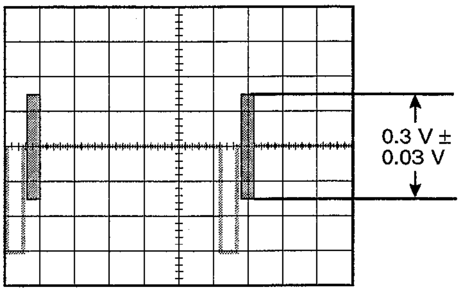


Fig. 4-1

- Trigger the Oscilloscope with V rate.
- Adjust VR602 so that the ID level becomes 0.7 V ± 0.015 V as shown in Fig. 4-2.

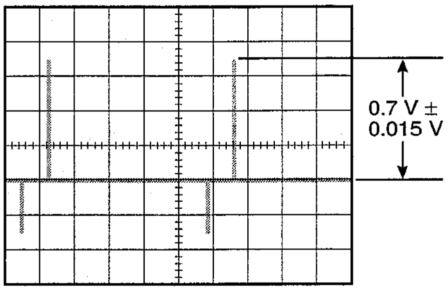


Fig. 4-2

(5). Record Output Level Adjustment

Test Point:	**Record Output Connector**	**Rear Panel**
Adjust:	**VR501 (REC BURST)**	**Main Board**
	VR502 (REC ID)	**Main Board**

- Disconnect all input signals from the WJ-FS409/WJ-FS416.
- Connect the terminated Oscilloscope with 75Ω to the Record Output Connector.
- Trigger the Oscilloscope with H rate.
- Adjust VR501 so that the Burst level becomes 0.3 V ± 0.03 V as shown in Fig. 4-1.
- Trigger the Oscilloscope with V rate.
- Adjust VR502 so that the ID level becomes 0.7 V ± 0.015 V as shown in Fig. 4-2.

). Input PLL DC Level Adjustment

est Point: **TP400 (C PLL DC)** **Main Board**
djust: **CT400 (C PLL DC)** **Main Board**

Supply the Ramp signal to the Video Input Connector 1.

Connect the Digital Voltmeter to TP400.

Adjust CT400 to obtain 2.5 V ± 0.3 V DC.

). Multiscreen Input Level Adjustment

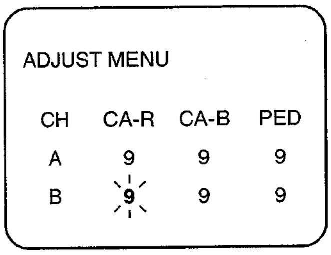
est Point: **Multiscreen Output Connector** **Rear Panel**
djust: **Increment/Decrement Buttons** **Front Panel**
VR200 (MULTI Y) **Main Board**
VR202 (MULTI C-2) **Main Board**
VR201 (MULTI C-1) **Main Board**

Supply the Ramp signal to the Video Input Connector 1.

Connect the Underscanned Colour Video Monitor through the Vectorscope and the Waveform Monitor to the Multiscreen Output Connector.

Set the gain control of the Vectorscope to maximum.

Move the cursor to **CA-R** item of **CH B** by pressing the Cursor Buttons (▼, ▲, ◄ and ►) as shown in Fig. 4-3.



ADJUST MENU

CH	CA-R	CA-B	PED
A	9	9	9
B	9	9	9

Fig. 4-3

- Adjust the data with the Increment/Decrement Buttons (+ and –) so that the vector positions at the center of the Vectorscope as shown in Fig. 4-4.

Positions at center.

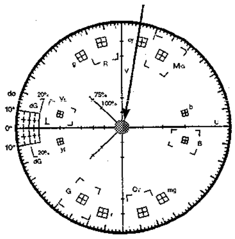
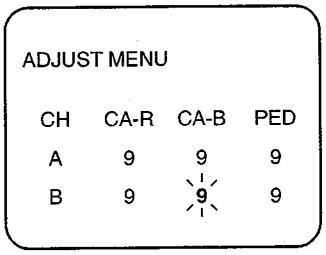


Fig. 4-4

- Move the cursor to **CA-B** item of **CH B** by pressing the Cursor Buttons (▼, ▲, ◄ and ►) as shown in Fig. 4-5.

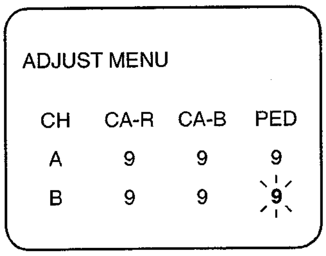


ADJUST MENU

CH	CA-R	CA-B	PED
A	9	9	9
B	9	9	9

Fig. 4-5

- Adjust the data with the Increment/Decrement Buttons (+ and –) so that the vector positions at the center of the Vectorscope as shown in Fig. 4-4.
- Repeat above four steps until the vector positions at the center of the Vectorscope as shown in Fig. 4-4.
- Move the cursor to **PED** item of **CH B** by pressing the Cursor Buttons (▼, ▲, ◄ and ►) as shown in Fig. 4-6.



ADJUST MENU

CH	CA-R	CA-B	PED
A	9	9	9
B	9	9	9

Fig. 4-6

- Adjust the data with the Increment/Decrement Buttons (+ and –) so that the Luminance Pedestal level becomes 0 mV $^{+7}_{-0}$ mV as shown in Fig. 4-7.

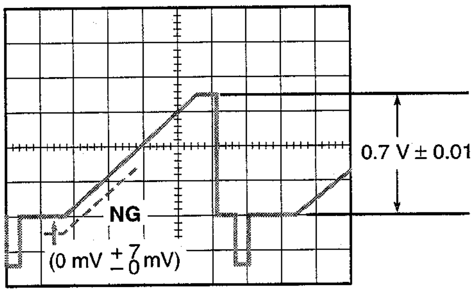


Fig. 4-7

- Adjust VR200 so that the Luminance level becomes 0.7 V ± 0.014 V as shown in Fig. 4-7.
- Supply the Colour Bar signal to the Video Input Connector 1.
- Set the gain control of the Vectorscope to the normal position.
- Adjust VR202 so that the Chromatic Gain becomes maximum as shown in Fig. 4-8.

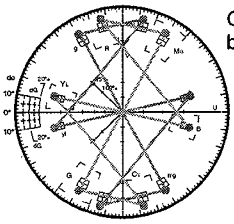
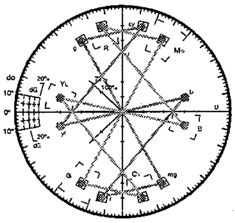


Fig. 4-8

- Adjust VR201 so that the vectors are adjusted to proper positions as shown in Fig. 4-9.



	Red	Yellow	Cyan
Gain	220 % ± 7%	155 % ± 10 %	220 % ± 10 %
Phase	103 ± 5°	167 ± 8°	283 ± 7°

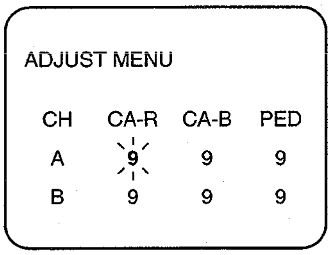
Fig. 4-9

- Press the Set Button (**SET**) to save the current setting conditions.

(8). Record Input Level Adjustment

Test Point:	**Record Output Connector**	**Rear Panel**
Adjust:	**Increment/Decrement Buttons**	**Front Panel**
	VR101 (REC Y)	**Main Board**
	VR103 (REC C-2)	**Main Board**
	VR102 (REC C-1)	**Main Board**

- Supply the Ramp signal to the Video Input Connector 1.
- Connect the Underscanned Colour Video Monitor through the Vectorscope and the Waveform Monitor to the Record Output Connector on the Rear Panel.
- Set the gain control of the Vectorscope to maximum.
- Move the cursor to **CA-R** item of **CH A** by pressing the Cursor Buttons (▼, ▲, ◄ and ►) as shown in Fig. 4-10.



ADJUST MENU

CH	CA-R	CA-B	PED
A	9	9	9
B	9	9	9

Fig. 4-10

- Adjust the data with the Increment/Decrement Buttons (+ and –) so that the vector positions at the center of the Vectorscope as shown in Fig. 4-11.

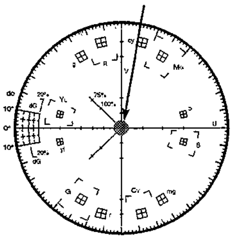
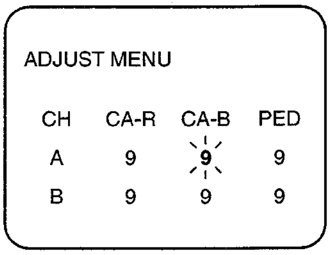


Fig. 4-11

- Move the cursor to **CA-B** item of **CH A** by pressing the Cursor Buttons (▼, ▲, ◄ and ►) as shown in Fig. 4-12.

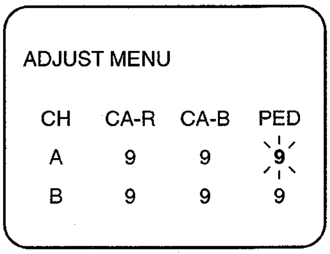


ADJUST MENU

CH	CA-R	CA-B	PED
A	9	9	9
B	9	9	9

Fig. 4-12

- Adjust the data with the Increment/Decrement Buttons (+ and –) so that the vector positions at the center of the Vectorscope as shown in Fig. 4-11.
- Repeat above four steps until the vector positions at the center of the Vectorscope as shown in Fig. 4-11.
- Move the cursor to **PED** item of **CH A** by pressing the Cursor Buttons (▼, ▲, ◄ and ►) as shown in Fig. 4-13.



ADJUST MENU

CH	CA-R	CA-B	PED
A	9	9	9
B	9	9	9

Fig. 4-13

- Adjust the data with the Increment/Decrement Buttons (+ and –) so that the Luminance Pedestal level becomes 0 mV $^{+7}_{-0}$ mV as shown in Fig. 4-14.

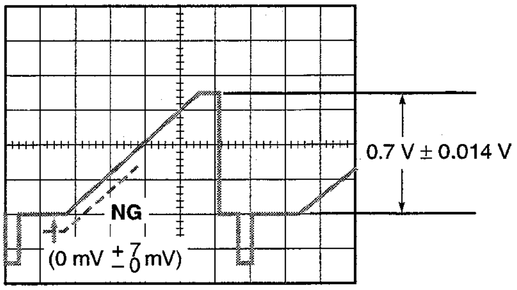


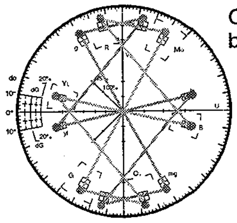
Fig. 4-14

Adjust VR101 so that the Luminance level becomes 0.7 V ± 0.014 V as shown in Fig. 4-14.

Supply the Colour Bar signal to the Video Input Connector 1.

Set the gain control of the Vectorscope to the normal position.

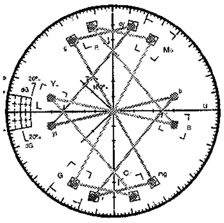
Adjust VR103 so that the Chromatic Gain becomes maximum as shown in Fig. 4-15.



Chromatic Gain becomes maximum.

Fig. 4-15

Adjust VR102 so that the vectors are adjusted to proper positions as shown in Fig. 4-16.



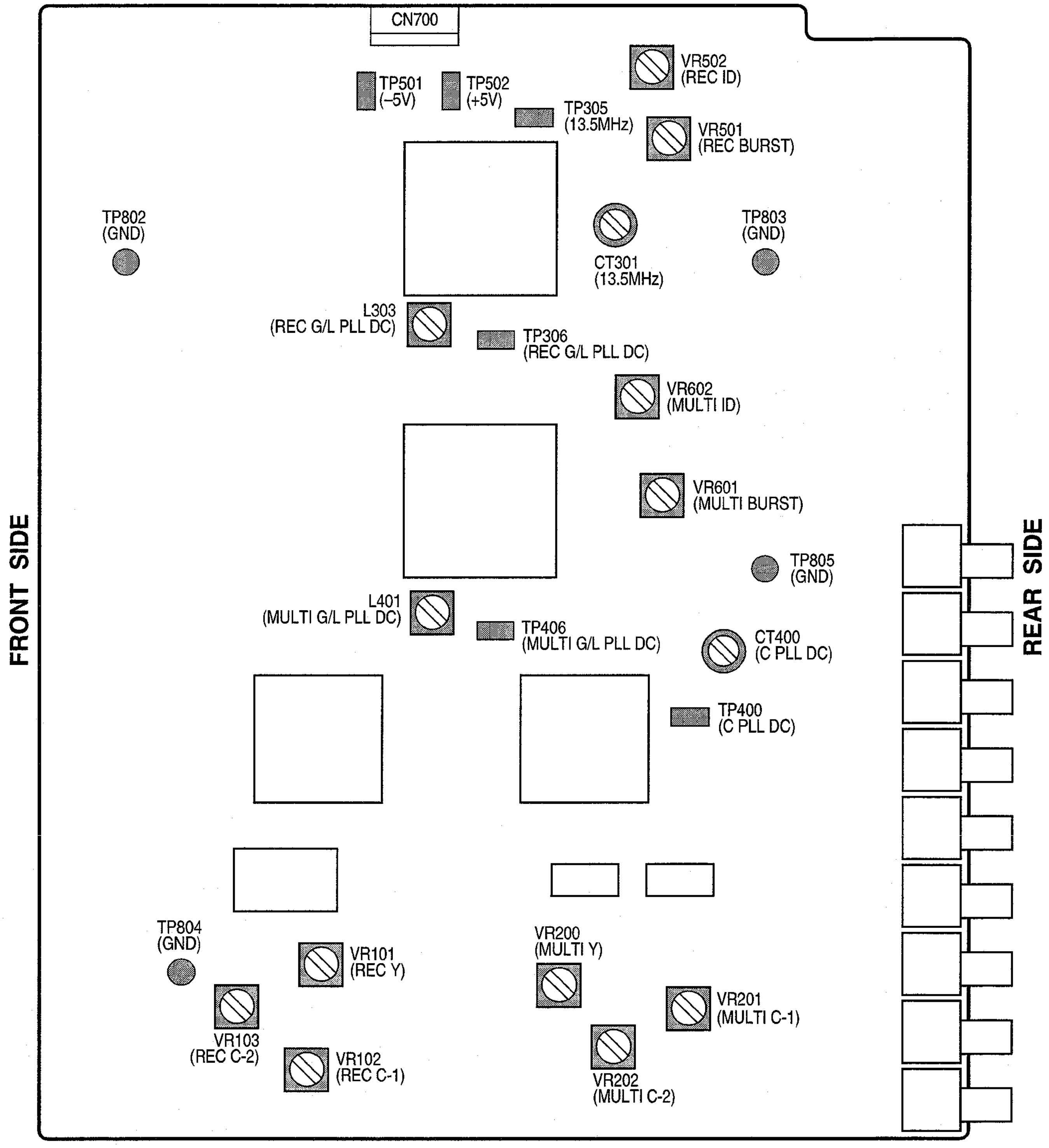
	Red	Yellow	Cyan
Gain	220 % ± 7%	155 % ± 10 %	220 % ± 10 %
Phase	103 ± 5°	167 ± 8°	283 ± 7°

Fig. 4-16

Press the Set Button (**SET**) to save the current setting conditions.

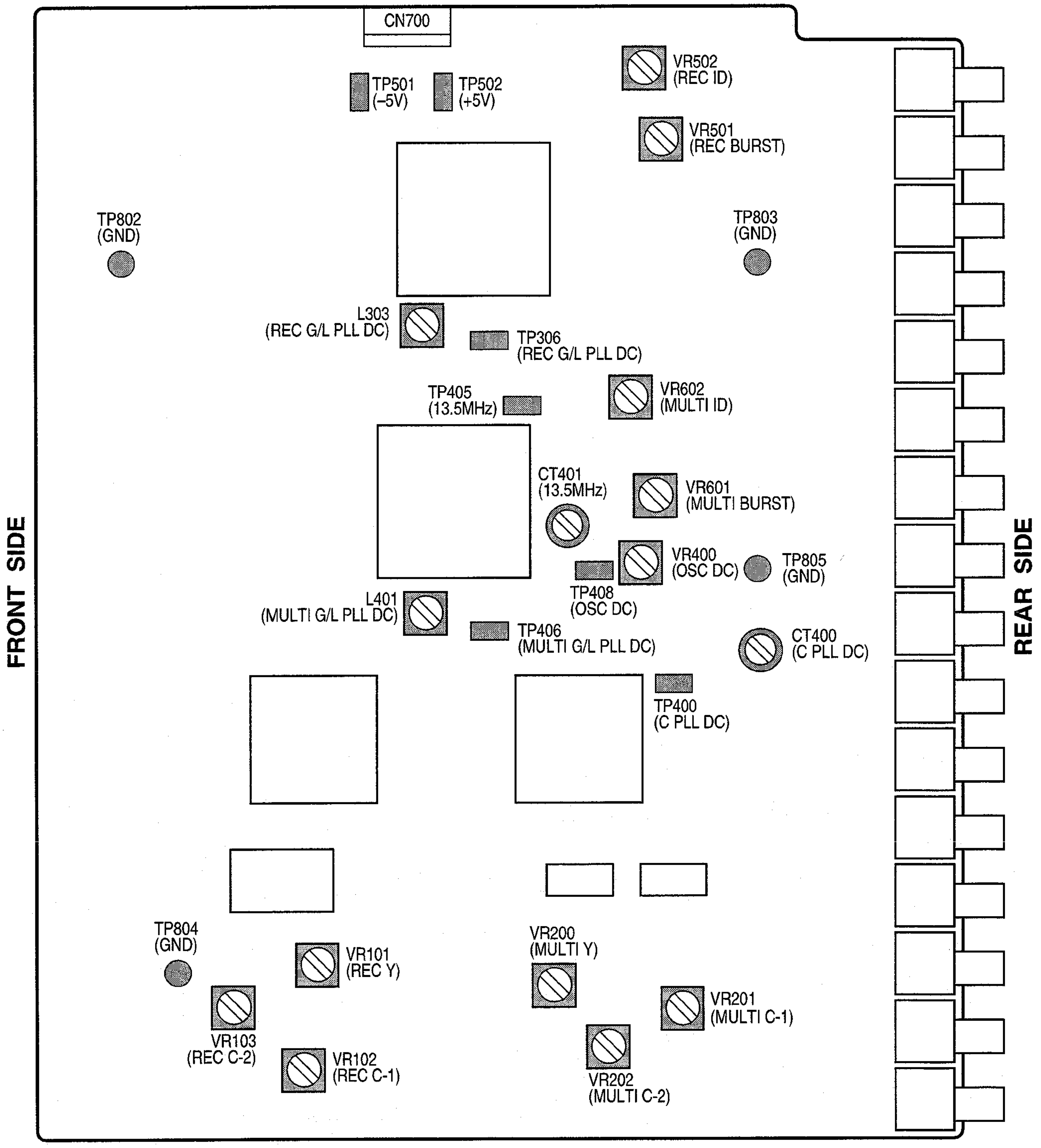
LOCATION OF TEST POINTS AND ADJUSTING CONTROLS

MAIN BOARD of WJ-FS409
(COMPONENT SIDE)

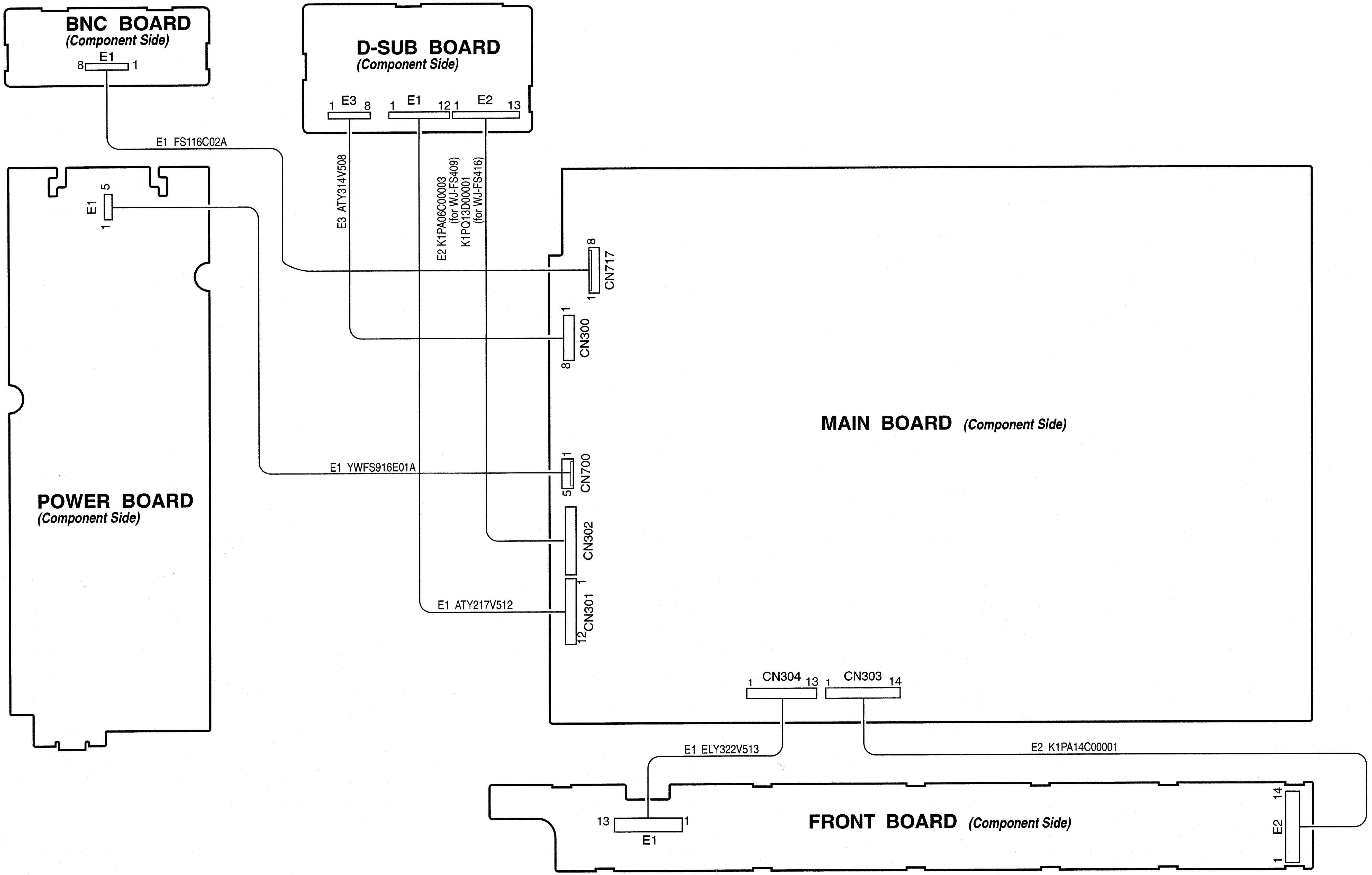


CN700
TP501
(-5V)
TP502
(+5V)
VR502
(REC ID)
TP305
(13.5MHz)
VR501
(REC BURST)
TP802
(GND)
CT301
(13.5MHz)
TP803
(GND)
L303
(REC G/L PLL DC)
TP306
(REC G/L PLL DC)
VR602
(MULTI ID)
VR601
(MULTI BURST)
FRONT SIDE
REAR SIDE
TP805
(GND)
L401
(MULTI G/L PLL DC)
TP406
(MULTI G/L PLL DC)
CT400
(C PLL DC)
TP400
(C PLL DC)
TP804
(GND)
VR101
(REC Y)
VR200
(MULTI Y)
VR201
(MULTI C-1)
VR103
(REC C-2)
VR102
(REC C-1)
VR202
(MULTI C-2)

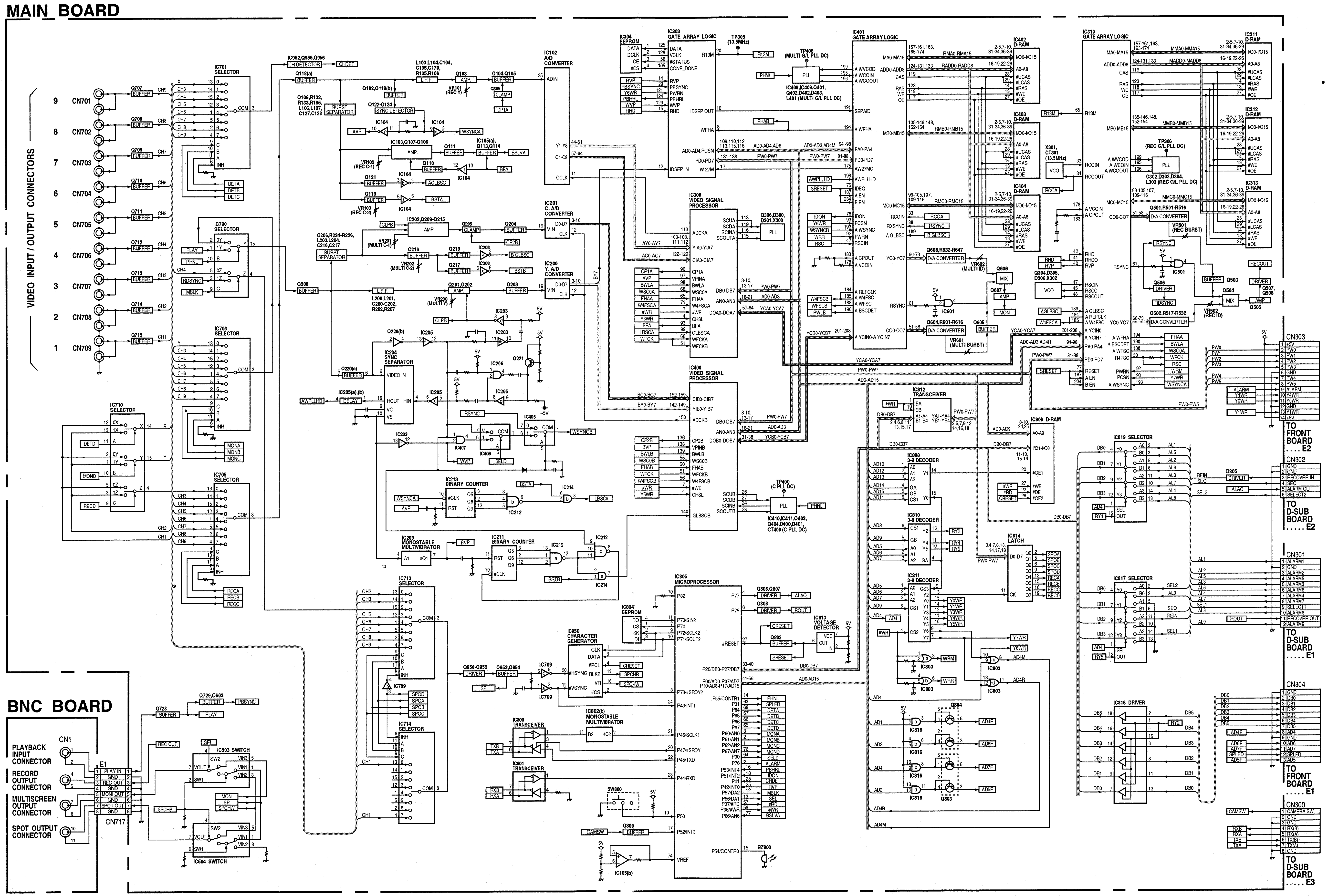
MAIN BOARD of WJ-FS416 (COMPONENT SIDE)


CN700
TP501
(−5V)
TP502
(+5V)
VR502
(REC ID)
VR501
(REC BURST)
TP802
(GND)
TP803
(GND)
L303
(REC G/L PLL DC)
TP306
(REC G/L PLL DC)
TP405
(13.5MHz)
VR602
(MULTI ID)
CT401
(13.5MHz)
VR601
(MULTI BURST)
VR400
(OSC DC)
TP805
(GND)
TP408
(OSC DC)
L401
(MULTI G/L PLL DC)
TP406
(MULTI G/L PLL DC)
CT400
(C PLL DC)
TP400
(C PLL DC)
FRONT SIDE
REAR SIDE
TP804
(GND)
VR101
(REC Y)
VR200
(MULTI Y)
VR201
(MULTI C-1)
VR103
(REC C-2)
VR102
(REC C-1)
VR202
(MULTI C-2)

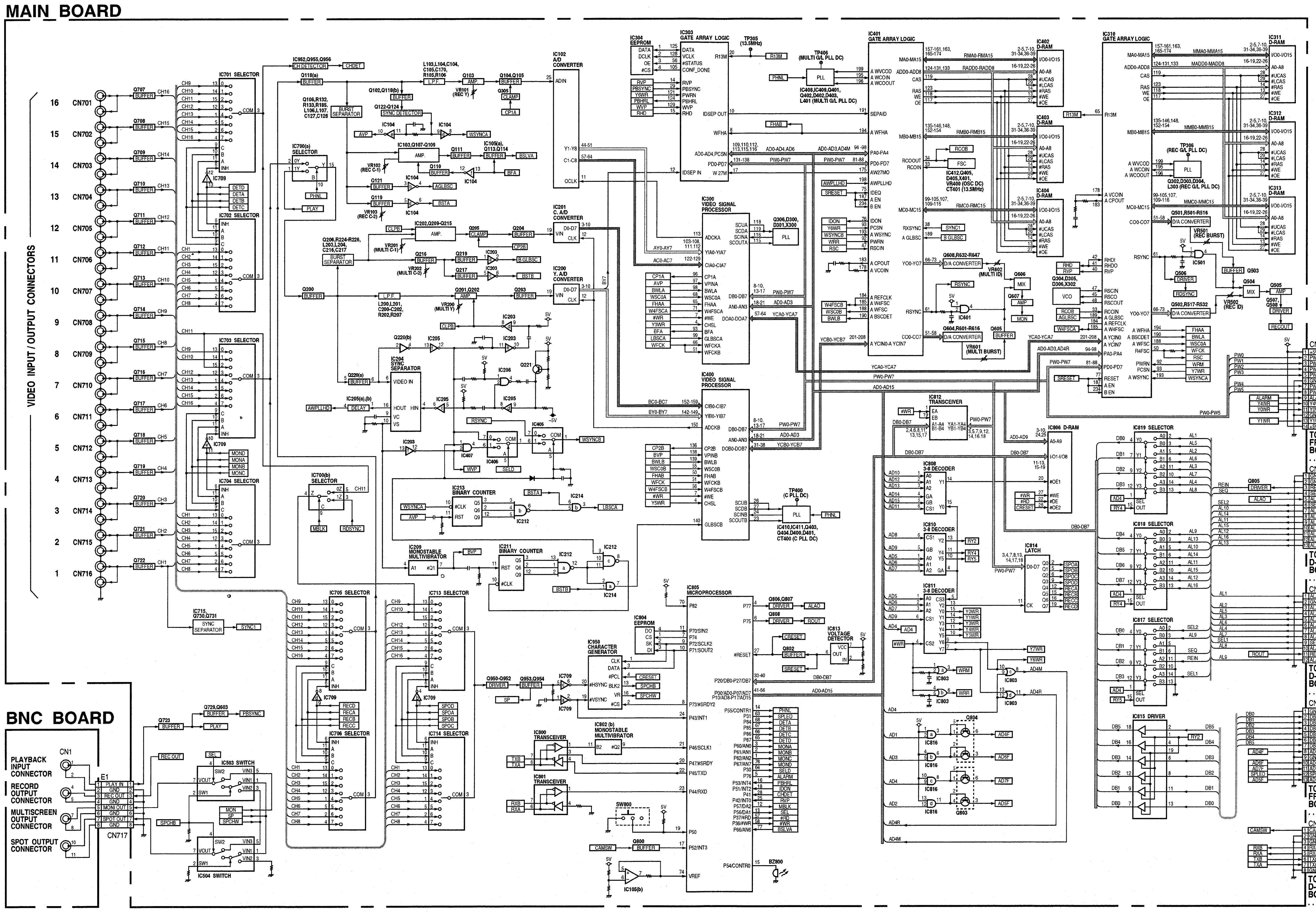
WIRING DIAGRAM


BNC BOARD
(Component Side)
E1
8
1
E1 FS116C02A
D-SUB BOARD
(Component Side)
1
E3
8
1
E1
12
1
E2
13
E3 ATY314V508
E2 K1PA06C00003
(for WJ-FS409)
K1PQ13D00001
(for WJ-FS416)
E1
5
1
8
CN717
1
1
CN300
8
MAIN BOARD (Component Side)
1
CN700
5
E1 YWFS916E01A
POWER BOARD
(Component Side)
CN302
1
CN301
12
E1 ATY217V512
1
CN304
13
1
CN303
14
E1 ELY322V513
E2 K1PA14C00001
13
E1
1
FRONT BOARD (Component Side)
14
E2
1

BLOCK DIAGRAM OF WJ-FS409

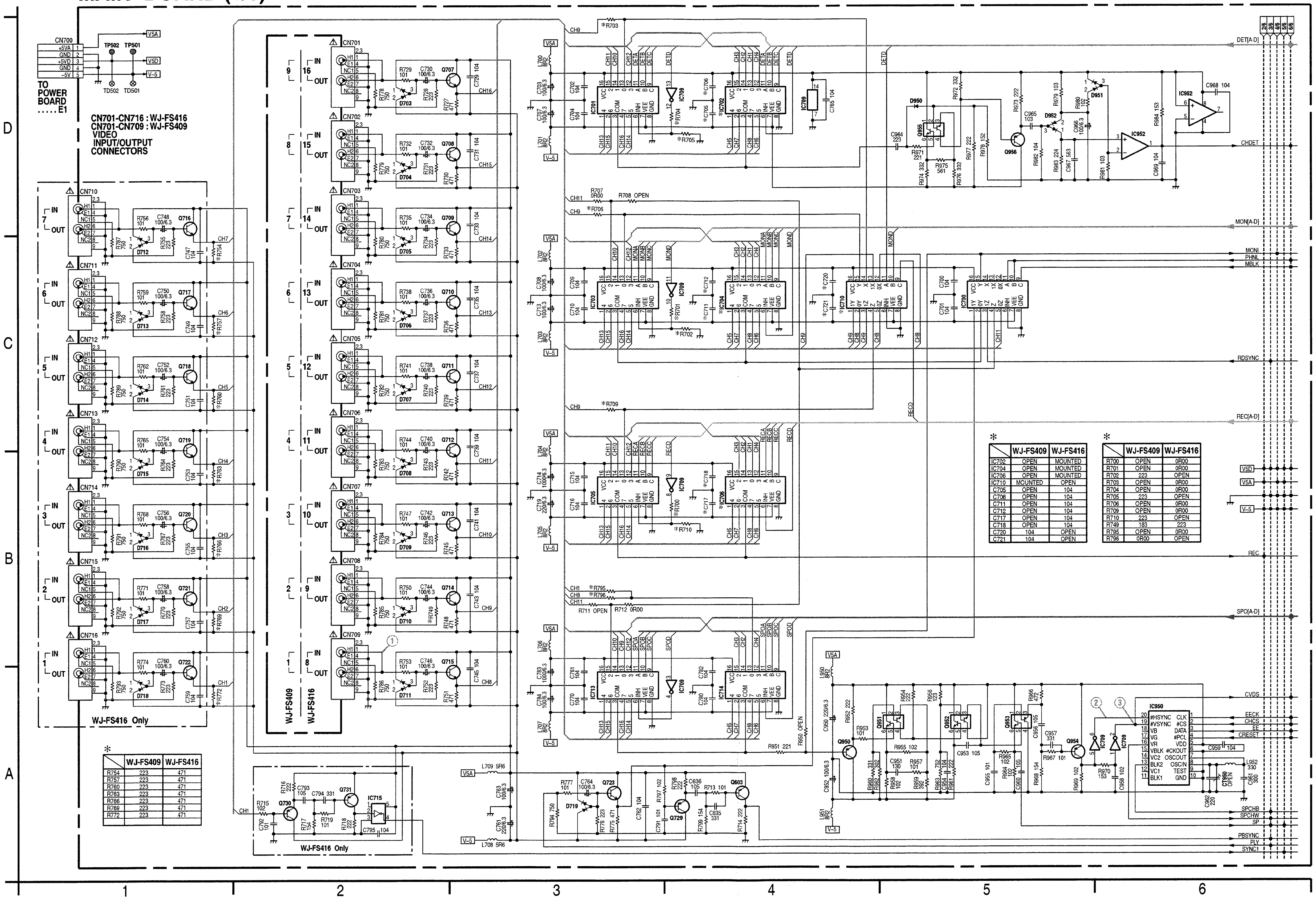

MAIN BOARD
BNC BOARD
VIDEO INPUT/OUTPUT CONNECTORS
CN701
CN702
CN703
CN704
CN705
CN706
CN707
CN708
CN709
IC701 SELECTOR
IC700 SELECTOR
IC703 SELECTOR
IC705 SELECTOR
IC710 SELECTOR
IC713 SELECTOR
IC714 SELECTOR
IC102 A/D CONVERTER
IC201 C. A/D CONVERTER
IC200 Y. A/D CONVERTER
IC204 SYNC SEPARATOR
IC213 BINARY COUNTER
IC209 MONOSTABLE MULTIVIBRATOR
IC211 BINARY COUNTER
IC304 EEPROM
IC303 GATE ARRAY LOGIC
IC300 VIDEO SIGNAL PROCESSOR
IC400 VIDEO SIGNAL PROCESSOR
IC401 GATE ARRAY LOGIC
IC402 D-RAM
IC403 D-RAM
IC404 D-RAM
IC310 GATE ARRAY LOGIC
IC311 D-RAM
IC312 D-RAM
IC313 D-RAM
IC812 TRANSCEIVER
IC806 D-RAM
IC808 3-8 DECODER
IC810 3-8 DECODER
IC811 3-8 DECODER
IC814 LATCH
IC819 SELECTOR
IC817 SELECTOR
IC815 DRIVER
IC805 MICROPROCESSOR
IC804 EEPROM
IC950 CHARACTER GENERATOR
IC802(b) MONOSTABLE MULTIVIBRATOR
IC800 TRANSCEIVER
IC801 TRANSCEIVER
IC813 VOLTAGE DETECTOR
IC503 SWITCH
IC504 SWITCH
CN717
CN303
CN302
CN301
CN304
CN300
TO FRONT BOARD E2
TO D-SUB BOARD E2
TO D-SUB BOARD E1
TO FRONT BOARD E1
TO D-SUB BOARD E3
PLAYBACK INPUT CONNECTOR
RECORD OUTPUT CONNECTOR
MULTISCREEN OUTPUT CONNECTOR
SPOT OUTPUT CONNECTOR
TP305 (13.5MHz)
TP406 (MULTI G/L PLL DC)
TP306 (REC G/L PLL DC)
TP400 (C PLL DC)
X301, CT301 (13.5MHz)
SW800
BZ800

BLOCK DIAGRAM OF WJ-FS416


MAIN BOARD
BNC BOARD
VIDEO INPUT / OUTPUT CONNECTORS
16 CN701
15 CN702
14 CN703
13 CN704
12 CN705
11 CN706
10 CN707
9 CN708
8 CN709
7 CN710
6 CN711
5 CN712
4 CN713
3 CN714
2 CN715
1 CN716
IC701 SELECTOR
IC702 SELECTOR
IC703 SELECTOR
IC704 SELECTOR
IC705 SELECTOR
IC706 SELECTOR
IC713 SELECTOR
IC714 SELECTOR
IC709
IC715, Q730, Q731 SYNC SEPARATOR
IC952, Q955, Q956 CH DETECTOR
CHDET
Q118(a) BUFFER
Q106, R132, R133, R185, L106, L107, C127, C128 BURST SEPARATOR
Q102, Q118(b) BUFFER
Q122-Q124 SYNC DETECTOR
L103, L104, C104, C105, C170, R105, R106 L.P.F.
Q103 AMP
VR101 (REC Y)
Q104, Q105 BUFFER
Q305 CLAMP
CP1A
IC104
AVP
WSYNCA
IC103, Q107-Q109 AMP.
Q111 BUFFER
IC105(a), Q113, Q114 BUFFER
BSLVA
BFA
Q110 BUFFER
VR102 (REC C-1)
Q121 BUFFER
AGLBSC
VR103 (REC C-2)
Q119 BUFFER
BSTA
IC700(a) SELECTOR
PHNL
PLAY
IC102 A/D CONVERTER
ADIN
Y1-Y8
C1-C8
OCLK
IC201 C. A/D CONVERTER
VIN D0-D7 CLK
IC200 Y. A/D CONVERTER
IC202, Q209-Q215 AMP.
CLPB
Q205 CLAMP
Q204 BUFFER
CP2B
Q206, R224-R226, L203, L204, C216, C217 BURST SEPARATOR
VR201 (MULTI C-1)
Q216 BUFFER
BGLBSC
VR202 (MULTI C-2)
Q217 BUFFER
BSTB
IC203
Q200 BUFFER
L.P.F. L200, L201, C200-C202, R202, R207
Q201, Q202 AMP
VR200 (MULTI Y)
Q203 BUFFER
Q220(b)
IC205
IC204 SYNC SEPARATOR
VIDEO IN HOUT HIN VC VS
Q220(a) BUFFER
IC205(a),(b) DELAY
AWPLLHD
IC206
Q221
IC405
WSYNCB
IC407
IC406
WVP
SELD
IC700(b) SELECTOR
MBLK
RDSYNC
IC213 BINARY COUNTER
WSYNCA
AVP
IC212
IC214
BSTA
LBSCA
IC209 MONOSTABLE MULTIVIBRATOR
BVP
IC211 BINARY COUNTER
BSTB
IC304 EEPROM
DATA DCLK OE #CS
IC302 GATE ARRAY LOGIC
TP305 (13.5MHz)
R13M
TP406 (MULTI G/L PLL DC)
PLL
IC408, IC409, Q401, Q402, D402, D403, L401 (MULTI G/L PLL DC)
RVP PBSYNC Y6WR PBHRL WVP RHD
IDSEP OUT
WFHA
IDSEP IN
FHAB
IC300 VIDEO SIGNAL PROCESSOR
Q306, D300, D301, X300
CP1A AVP BWLA WSC0A #WR W4FSCA Y3WR BFA LBSCA WFCK
IC400 VIDEO SIGNAL PROCESSOR
CP2B BVP BWLB WSC0B FHAB WFCK W4FSCB #WR Y5WR
TP400 (C PLL DC)
IC410, IC411, Q403, Q404, D400, D401, CT400 (C PLL DC)
IC401 GATE ARRAY LOGIC
IC402 D-RAM
IC403 D-RAM
IC404 D-RAM
FSC
IC412, Q405, D405, X401, VR400 (OSC DC) CT401 (13.5MHz)
RCOB
SYNC1
BGLBSC
Q608, R632-R647 D/A CONVERTER
VR602 (MULTI D)
Q606 MIX
Q607 AMP
MON
IC601
Q604, R601-R616 D/A CONVERTER
Q605 BUFFER
VR601 (MULTI BURST)
AWPLLHD
SRESET
IDON Y6WR WSYNCB WRR RSC
W4FSCB WSC0B BWLB
IC310 GATE ARRAY LOGIC
IC311 D-RAM
IC312 D-RAM
IC313 D-RAM
R13M
TP306 (REC G/L PLL DC)
Q302, D303, D304, L303 (REC G/L PLL DC)
Q501, R501-R516 D/A CONVERTER
VR501 (REC BURST)
IC501
Q506 DRIVER
RDSYNC
Q503
Q504 MIX
Q505 AMP
Q507, Q508 DRIVER
RECOUT
VR502 (REC ID)
Q502, R517-R532 D/A CONVERTER
Q304, D305, D306, X302 VCO
RHD RVP
RCOB AGLBSC
W4FSCA
FHAA BWLA WSC0A WFCK RSC WRM Y7WR WSYNCA
SRESET
IC812 TRANSCEIVER
IC806 D-RAM
IC808 3-8 DECODER
IC810 3-8 DECODER
IC811 3-8 DECODER
IC814 LATCH
SPOA SPOB SPOC SPOD RECA RECB RECC RECD
RY2 RY4 RY5
Y0WR Y1WR Y2WR Y3WR Y5WR Y7WR Y6WR
IC803
WRM WRR
IC816
Q804
Q803
AD4F AD5F AD6F AD7F AD3F
IC819 SELECTOR
IC818 SELECTOR
IC817 SELECTOR
IC815 DRIVER
RY2
Q805 DRIVER
REIN SEQ
ALAO
ROUT
IC805 MICROPROCESSOR
Q806, Q807 DRIVER
ALAO
Q808 DRIVER
ROUT
IC804 EEPROM
IC950 CHARACTER GENERATOR
CRESET SPCHB SPCHW
IC813 VOLTAGE DETECTOR
Q802 BUFFER
SRESET
Q950-Q952 DRIVER
Q953, Q954 BUFFER
IC709
SP
IC802(b) MONOSTABLE MULTIVIBRATOR
IC800 TRANSCEIVER
TXB TXA
IC801 TRANSCEIVER
RXB RXA
SW800
Q800 BUFFER
CAMSW
IC105(b)
BZ800
PHNL SPLED DETA DETB DETC DETD MONA MONB MONC MOND SELD ALARM CHDET IDON RVP MBLK #WR #RD BSLVA
CN303
TO FRONT BOARD E2
CN302
TO D-SUB BOARD E2
CN301
TO D-SUB BOARD E1
CN304
TO FRONT BOARD E1
CN300
TO D-SUB BOARD E3
PLAYBACK INPUT CONNECTOR
RECORD OUTPUT CONNECTOR
MULTISCREEN OUTPUT CONNECTOR
SPOT OUTPUT CONNECTOR
CN1
E1
CN717
PLAY IN GND REC OUT GND MONI OUT GND SPOT OUT GND
Q723 BUFFER
Q729, Q603 BUFFER
PBSYNC
PLAY
REC OUT
SEL
IC503 SWITCH
IC504 SWITCH
MON SP SPCHW
SPCHB

SCHEMATIC DIAGRAM OF MAIN BOARD (1/6)

MAIN BOARD (1/6)


CN700
+5VA
GND
+5VD
GND
–5V
TP502
TP501
TD502
TD501
V5A
V5D
V–5
TO POWER BOARD E1
CN701-CN716 : WJ-FS416
CN701-CN709 : WJ-FS409
VIDEO INPUT/OUTPUT CONNECTORS
CN710
CN711
CN712
CN713
CN714
CN715
CN716
CN701
CN702
CN703
CN704
CN705
CN706
CN707
CN708
CN709
IN
OUT
WJ-FS416 Only
WJ-FS409
WJ-FS416
IC701
IC702
IC703
IC704
IC705
IC706
IC709
IC710
IC713
IC714
IC715
IC950
IC952
Q603
Q723
Q729
Q730
Q731
Q950
Q951
Q952
Q953
Q954
Q955
Q956
D950
D951
D952
DET[A-D]
CHDET
MON[A-D]
MONI
PHNL
MBLK
RDSYNC
REC[A-D]
REC
SPO[A-D]
CVDS
EECK
CHCS
EE
CRESET
SPCHB
SPCHW
SP
PBSYNC
PLY
SYNC1
①
②
③
1
2
3
4
5
6
A
B
C
D

*

	WJ-FS409	WJ-FS416
R754	223	471
R757	223	471
R760	223	471
R763	223	471
R766	223	471
R769	223	471
R772	223	471

*

	WJ-FS409	WJ-FS416
IC702	OPEN	MOUNTED
IC704	OPEN	MOUNTED
IC706	OPEN	MOUNTED
IC710	MOUNTED	OPEN
C705	OPEN	104
C706	OPEN	104
C711	OPEN	104
C712	OPEN	104
C717	OPEN	104
C718	OPEN	104
C720	104	OPEN
C721	104	OPEN

*

	WJ-FS409	WJ-FS416
R700	OPEN	0R00
R701	OPEN	0R00
R702	223	OPEN
R703	OPEN	0R00
R704	OPEN	0R00
R705	223	OPEN
R706	OPEN	0R00
R709	OPEN	0R00
R710	223	OPEN
R749	183	223
R795	OPEN	0R00
R796	0R00	OPEN

< VOLTAGE > MAIN BOARD (1/6)

	IC700	IC701		IC702	IC703		IC704	IC705		IC706
		FS409	FS416		FS409	FS416		FS409	FS416	
Pin 1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
2	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
3	–0.4	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
4	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
5	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
6	0	0	5.2	5.0	0	5.2	0	0	5.2	0
7	–5.3	–5.3	–5.3	–5.3	–5.3	–5.3	–5.3	–5.3	–5.3	–5.3
8	0	0	0	0	0	0	0	0	0	0
9	0	–	–	–	0	0	0	0	0	0
10	0	–	–	–	0	0	0	0	0	0
11	0	–	–	–	0	0	0	0	0	0
12	–	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
13	–	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
14	–	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
15	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1	–2.1
16	5.2	5.2	5.2	5.1	5.2	5.2	5.2	5.2	5.2	5.2

	IC709		IC713	IC714	IC715	IC950	IC952
	FS409	FS416					
Pin 1	0.4	0.4	–2.1	–2.1	–	–	–
2	5.1	5.1	–2.1	–2.1	0.4	5.0	2.0
3	0	0	–2.1	–2.1	0	–	–
4	5.2	5.2	–2.1	–2.1	4.6	4.4	0
5	0.4	0.4	–2.1	–2.1	5.0	5.1	0
6	4.7	4.7	5.2	0		0	5.2
7	0	0	–5.3	–5.3		2.2	0
8	5.2	5.2	0	0		2.1	5.2
9	0	0	0	0		0	
10	5.2	5.2	0	0		0	
11	0	0	0	0		0	
12	–	5.2	–2.1	–2.1		0	
13	–	–	–2.1	–2.1		0	
14	5.2	5.2	–2.1	–2.1		0	
15			–2.1	–2.1		0	
16			5.2	5.2		0.6	
17						0	
18						0	
19						5.1	
20						4.7	

	Q951	Q952
1	5.1	5.1
2	–0.5	2.0
3	–1.2	2.4
4	1.0	5.1
5	–1.5	1.0
6	–2.1	0.4

	Q953	Q955
1	5.1	5.2
2	1.8	–2.2
3	2.4	–2.8
4	0	1.4
5	2.4	–2.3
6	1.8	–3.0

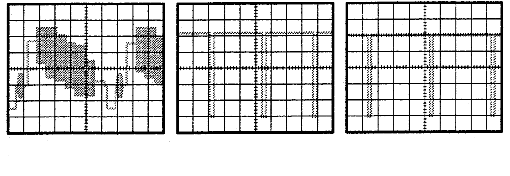
	B	C	E
Q603	4.4	5.0	4.9
Q707	–1.4	5.0	–2.1
Q708	–1.4	5.0	–2.1
Q709	–1.4	5.0	–2.1
Q710	–1.4	5.0	–2.1
Q711	–1.4	5.0	–2.1
Q712	–1.4	5.0	–2.1
Q713	–1.4	5.0	–2.1
Q714	–1.4	5.0	–2.1
Q715	–1.4	5.0	–2.1
Q716	–1.4	5.0	–2.1
Q717	–1.4	5.0	–2.1
Q718	–1.4	5.0	–2.1

	B	C	E
Q719	–1.4	5.0	–2.1
Q720	–1.4	5.0	–2.1
Q721	–1.4	5.0	–2.1
Q722	–1.4	5.0	–2.1
Q723	–1.4	5.0	–2.1
Q729	–2.1	–5.2	–1.5
Q730	–2.1	–1.4	–5.2
Q731	4.8	5.0	0.4
Q950	–2.1	–5.3	–1.5
Q954	5.3	0.4	5.1
Q956	1.4	–5.3	2.0

< INDEX > MAIN BOARD (1/6)

IC700	C5
IC701	D3
IC702	D4 for **WJ-FS416**
IC703	C3
IC704	C4 for **WJ-FS416**
IC705	B3
IC706	B4 for **WJ-FS416**
IC709	A4,A6,B4,C4,D4
IC710	C4 for **WJ-FS409**
IC713	A3
IC714	A4
IC715	A2 for **WJ-FS416**
IC950	A6
IC952	D6
Q603	A4
Q707	D3
Q708	D3
Q709	D3
Q710	C3
Q711	C3
Q712	C3
Q713	B3
Q714	B3
Q715	A3
Q716	D1 for **WJ-FS416**
Q717	C1 for **WJ-FS416**
Q718	C1 for **WJ-FS416**
Q719	C1 for **WJ-FS416**
Q720	B1 for **WJ-FS416**
Q721	B1 for **WJ-FS416**
Q722	A1 for **WJ-FS416**
Q723	A3
Q729	A4
Q730	A2 for **WJ-FS416**
Q731	A2 for **WJ-FS416**
Q950	A4
Q951	A5
Q952	A5
Q953	A5
Q954	A5
Q955	D5
Q956	D5
D703	D2
D704	D2
D705	C2
D706	C2
D707	C2
D708	B2
D709	B2
D710	B2
D711	A2
D712	C1 for **WJ-FS416**
D713	C1 for **WJ-FS416**
D714	C1 for **WJ-FS416**
D715	B1 for **WJ-FS416**
D716	B1 for **WJ-FS416**
D717	B1 for **WJ-FS416**
D718	A1 for **WJ-FS416**
D719	A3
D950	D5
D951	D6
D952	D5

< WAVEFORM > MAIN BOARD (1/6)



1. 10 µs/DIV, 0.2 V/DIV
2. 20 µs/DIV, 1 V/DIV
3. 5 ms/DIV, 1 V/DIV

Important safety notice

Components Identified by " ⚠ " mark have special characteristics for safety.
When replacing any of these components, use only manufacturer's specified parts.

Note: The value indicated in the schematic diagram should be read as follows:

☐☐☐

- Multiplier (0 - 5)
- 2nd. Significant Digit (0 - 9)
- 1st. Significant Digit (1 - 9)

<Example>

For Resistor:

330 ➡ $33 \times 10^0 = 33\,\Omega$
561 ➡ $56 \times 10^1 = 560\,\Omega$
123 ➡ $12 \times 10^3 = 12\text{k}\,\Omega$
0R00 = 0 Ω

For Capacitor
(Except Electrolytic Capacitor and Tantalum Capacitor):

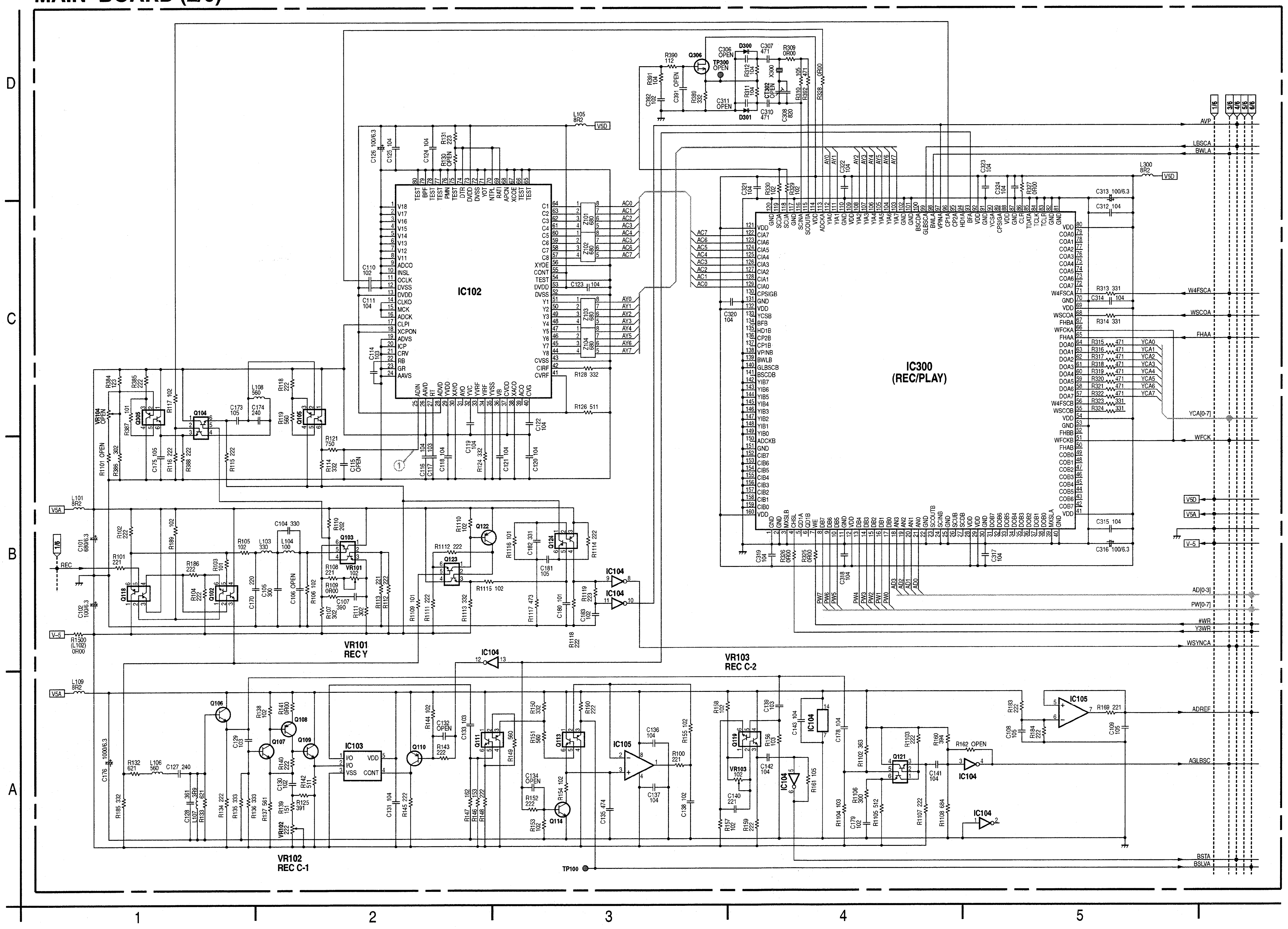
820 ➡ $82 \times 10^0 =$ 82 pF
102 ➡ $10 \times 10^2 =$ 1000 pF = 0.001 µF
104 ➡ $10 \times 10^4 =$ 100000 pF = 0.1 µF

For Coil:

010 ➡ $1 \times 10^0 =$ 1 µH
8R2 ➡ $8.2 \times 10^0 =$ 8.2 µH
101 ➡ $10 \times 10^1 =$ 100 µH

SCHEMATIC DIAGRAM OF MAIN BOARD (2/6)

MAIN BOARD (2/6)


IC102
IC300
(REC/PLAY)
IC103
IC104
IC105
VR101
REC Y
VR102
REC C-1
VR103
REC C-2
TP100
TP300
V5D
V5A
V-5
REC
AVP
LBSCA
BWLA
W4FSCA
WSCOA
FHAA
YCA[0-7]
WFCK
AD[0-3]
PW[0-7]
#WR
Y3WR
WSYNCA
ADREF
AGLBSC
BSTA
BSLVA
1/6
3/6
4/6
5/6
6/6
A
B
C
D
1
2
3
4
5

< VOLTAGE >
MAIN BOARD (2/6)

	IC103	IC104	IC105
Pin 1	–0.6	0	0.4
2	–0.5	5.1	0.4
3	–5.2	2.4	0.4
4	–4.8	2.9	–5.2
5	5.1	2.5	2.5
6		2.4	2.5
7		0	2.5
8		5.1	5.1
9		0.2	
10		4.9	
11		0.4	
12		5.0	
13		0.4	
14		5.1	

	B	C	E
Q106	0	5.1	–0.6
Q107	–0.3	4.3	–3.8
Q108	4.3	0.5	5.1
Q109	0.5	5.1	–0.5
Q110	5.0	5.1	–4.8
Q122	4.5	5.1	1.1
Q306	(G)2.6	(S)4.9	(D)2.8

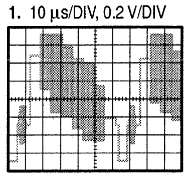
	Q102	Q103	Q104	Q105
1	4.5	5.1	5.1	5.1
2	–0.2	–0.5	0.1	1.3
3	–0.8	–1.1	1.0	1.9
4	5.1	1.5	1.3	–5.2
5	–1.4	–0.7	1.5	1.9
6	–2.0	–1.3	0.9	1.3

	Q111	Q113	Q118	Q119
1	5.1	5.1	–5.2	0.7
2	–1.1	0.4	4.5	0.6
3	–0.5	0.9	5.1	0
4	–5.2	–5.2	–0.2	5.1
5	–0.5	–0.5	–2.1	–0.2
6	–1.1	–1.1	–1.4	–0.8

	Q121	Q123	Q124	Q305
1	4.3	4.5	–5.2	5.1
2	4.3	1.1	6.2	1.0
3	3.6	0.4	5.1	1.6
4	5.1	5.1	0.4	0
5	–3.0	–0.8	0.4	1.6
6	–3.5	–1.4	1.1	1.0

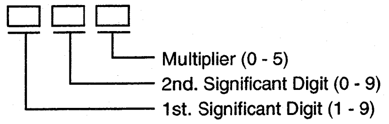
< WAVEFORM >
MAIN BOARD (2/6)

1. 10 µs/DIV, 0.2 V/DIV



Note: The value indicated in the schematic diagram should be read as follows:

<Example>


Multiplier (0 - 5)
2nd. Significant Digit (0 - 9)
1st. Significant Digit (1 - 9)

For Resistor:
330 ➡ 33 x 10^0 = 33 Ω
561 ➡ 56 x 10^1 = 560 Ω
123 ➡ 12 x 10^3 = 12k Ω
0R00 = 0 Ω

For Capacitor
(Except Electrolytic Capacitor and Tantalum Capacitor):
820 ➡ 82 x 10^0 = 82 pF
102 ➡ 10 x 10^2 = 1000 pF = 0.001 µF
104 ➡ 10 x 10^4 = 100000 pF = 0.1 µF

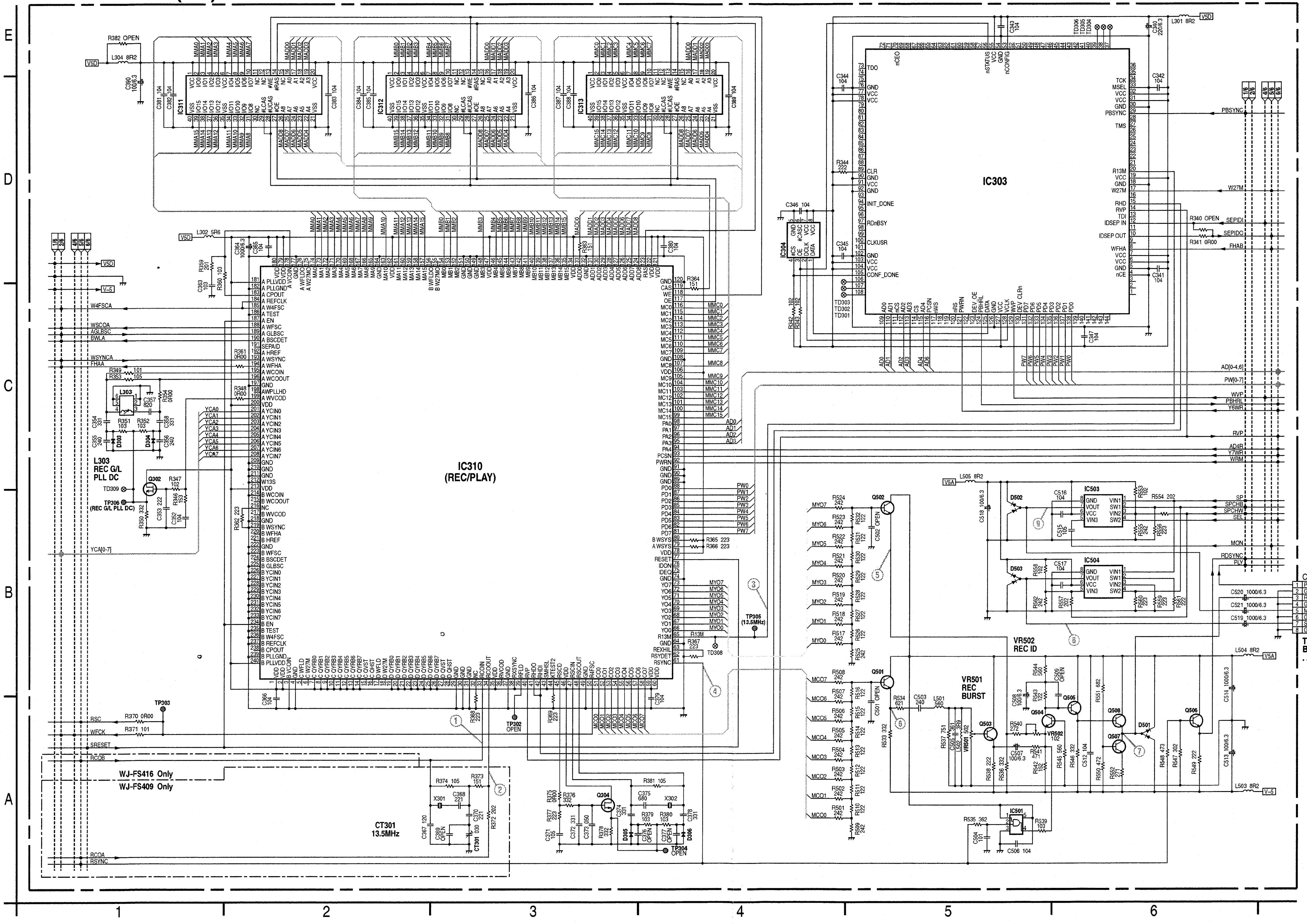
For Coil:
010 ➡ 1 x 10^0 = 1 µH
8R2 ➡ 8.2 x 10^0 = 8.2 µH
101 ➡ 10 x 10^1 = 100 µH

< INDEX >
MAIN BOARD (2/6)

IC102	C2	Q102	B1	Q108	A2	Q118	B1	Q305	C1
IC103	A2	Q103	B2	Q109	A2	Q119	A4	Q306	D3
IC104	A4,A5,B3	Q104	C1	Q110	A2	Q121	A4		
IC105	A3,A5	Q105	C2	Q111	A2	Q122	B2	D300	D4
IC300	C4	Q106	A1	Q113	A3	Q123	B2	D301	D4
		Q107	A2	Q114	A3	Q124	B3		

SCHEMATIC DIAGRAM OF MAIN BOARD (3/6)

MAIN BOARD (3/6)

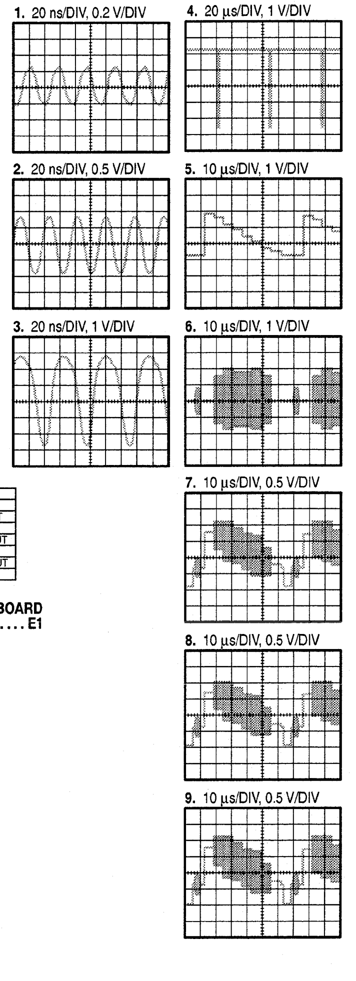

IC303
IC304
IC310
(REC/PLAY)
IC311
IC312
IC313
IC501
IC503
IC504
CT301
13.5MHz
L303
REC G/L
PLL DC
TP305
(13.5MHz)
VR501
REC
BURST
VR502
REC ID
CN717
TO
BNC BOARD
..........E1
WJ-FS416 Only
WJ-FS409 Only
E
D
C
B
A
1
2
3
4
5
6

< VOLTAGE > MAIN BOARD (3/6)

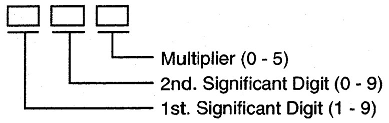
	IC304	IC501	IC503	IC504
Pin 1	–	5.1	3.0	3.0
2	0	4.6	0	0
3	5.0	0	2.8	2.0
4	5.0	4.7	5.0	0
5	0	5.1	2.7	2.8
6	5.1		5.1	5.1
7	5.1		1.9	2.2
8	5.1		0	0

	B	C	E	
Q302	(G)2.4	(S)5.0	(D)2.6	
Q304	(G)2.9	(S)5.0	(D)3.2	for WJ-FS409
Q304	(G)0	(S)5.0	(D)0.5	for WJ-FS416
Q501	2.5	5.1	1.9	
Q502	1.0	5.1	0.4	
Q503	0	5.1	–0.6	
Q504	0	2.2	–0.6	
Q505	2.2	5.1	1.6	
Q506	0.3	5.1	–0.4	
Q507	–1.2	1.0	–1.8	
Q508	1.6	5.1	1.0	

< WAVEFORM > MAIN BOARD (3/6)



Note: The value indicated in the schematic diagram should be read as follows:


Multiplier (0 - 5)
2nd. Significant Digit (0 - 9)
1st. Significant Digit (1 - 9)

<Example>

For Resistor:

330 ➡ 33 x 10^0 = 33 Ω

561 ➡ 56 x 10^1 = 560 Ω

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(Except Electrolytic Capacitor and Tantalum Capacitor):

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010 ➡ 1 x 10^0 = 1 µH

8R2 ➡ 8.2 x 10^0 = 8.2 µH

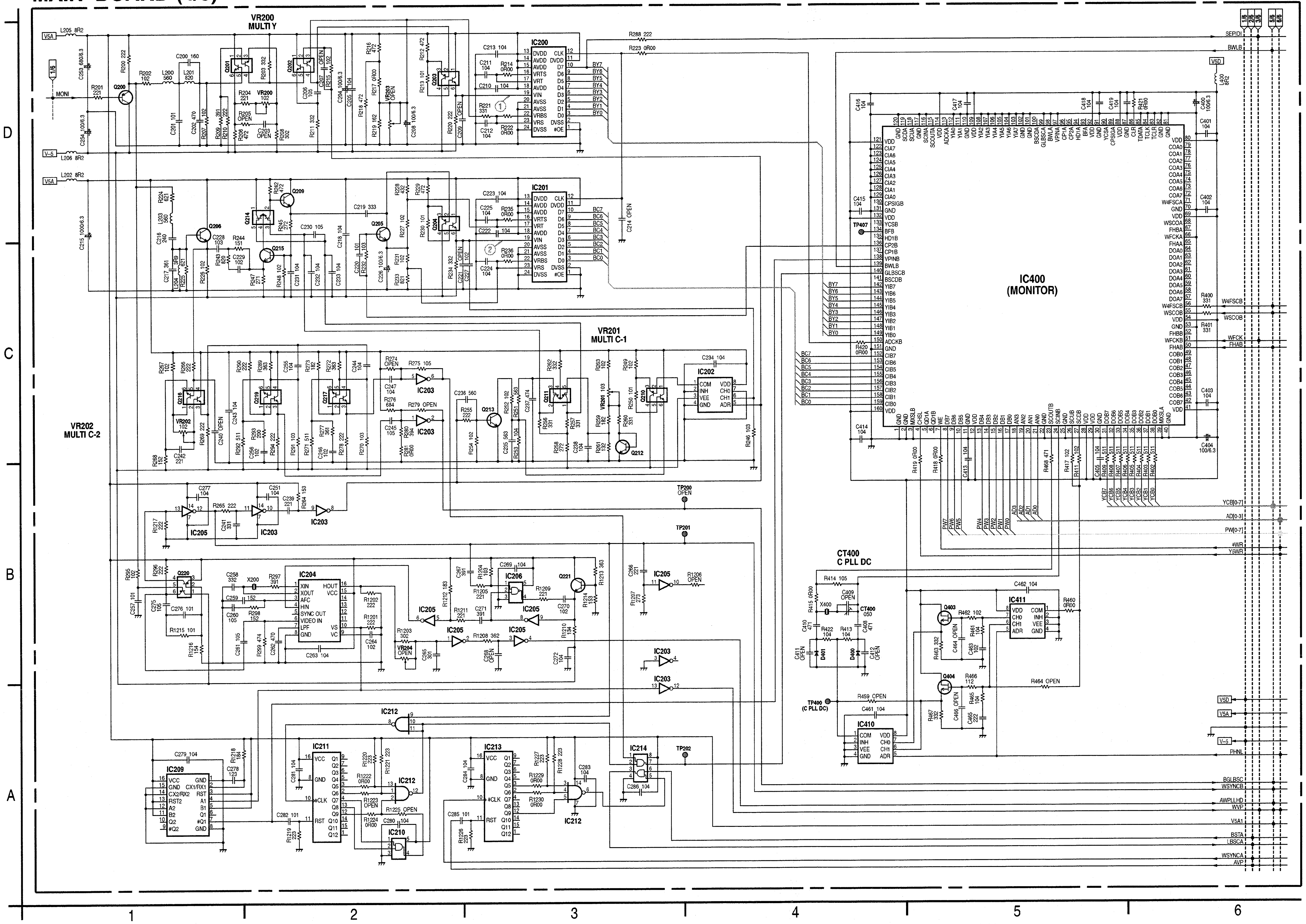
101 ➡ 10 x 10^1 = 100 µH

< INDEX > MAIN BOARD (3/6)

IC303	D5	IC501	A5	Q501	B5	Q507	A6	D501	A6
IC304	D4	IC503	B6	Q502	B5	Q508	A6	D502	B5
IC310	C3	IC504	B6	Q503	A5	D303	C1	D503	B5
IC311	D2			Q504	A5	D304	C1		
IC312	D3	Q302	C1	Q505	A6	D305	A3		
IC313	D4	Q304	A3	Q506	A6	D306	A4		

SCHEMATIC DIAGRAM OF MAIN BOARD (4/6)

MAIN BOARD (4/6)


VR200
MULTI Y
IC200
IC201
VR201
MULTI C-1
VR202
MULTI C-2
IC202
IC203
IC204
IC205
IC206
IC209
IC210
IC211
IC212
IC213
IC214
IC400
(MONITOR)
CT400
C PLL DC
IC410
IC411
TP200
OPEN
TP201
TP202
TP400
(C PLL DC)
TP407
V5A
V-5
V5D
MONI
SEPIDI
BWLB
W4FSCB
WSCOB
WFCK
FHAB
YCB[0-7]
AD[0-3]
PW[0-7]
#WR
YSWR
PHNL
BGLBSC
WSYNCB
AWPLLHD
WVP
VSA1
BSTA
UBSCA
WSYNCA
AVP
D
C
B
A
1
2
3
4
5
6

< VOLTAGE > MAIN BOARD (4/6)

	IC200	IC201	IC202	IC203	IC204	IC205	IC206
Pin 1	0	0	0	2.1	2.7	0.3	4.9
2	0	0	0	3.5	2.2	4.7	1.2
3	2.1	2.2	–5.3	0	2.4	4.7	0
4	2.3	2.3	0	5.0	0.4	0.3	3.8
5	2.2	2.2	0.2	2.4	0.4	4.6	5.0
6	1.6	1.6	0	2.4	3.1	0.4	
7	1.6	1.6	0	0	2.4	0	
8	1.7	1.7	5.1	0.2	0	1.2	
9	1.4	1.4		4.8	0.3	3.3	
10	0.9	1.3		0.4	0.1	4.6	
11	5.0	5.1		4.6	–0.1	0.4	
12	2.2	2.2		5.0	5.0	4.6	
13	5.0	5.1		0.1	0	0.4	
14	5.0	5.1		5.0	4.4	5.0	
15	5.0	5.1			5.0		
16	2.7	2.7			0.3		
17	2.7	2.7					
18	5.0	5.1					
19	1.1	1.6					
20	0	0					
21	0	0					
22	0.7	0.6					
23	0.7	0.6					
24	0	0					

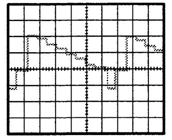
	IC209	IC210	IC211	IC212	IC214
Pin 1	0	2.0	0	5.0	2.4
2	4.6	*2.1	2.1	0.9	4.4
3	5.0	0	2.7	2.5	2.2
4	0.1	1.0	2.0	2.5	0
5	5.0	5.0	2.2	1.0	4.9
6	0.3		2.2	4.9	2.4
7	4.7		2.2	0	2.1
8	0		0	1.0	5.0
9	5.0		2.2	4.6	
10	0		1.0	4.4	
11	5.0		0	4.4	
12	0		0.9	4.4	
13	5.0		2.1	2.7	
14	0		0	5.0	
15	0		0		
16	5.0		5.0		

	B	C	E
Q200	–2.1	–5.3	–1.4
Q205	0.1	1.7	1.7
Q206	0	5.1	–0.7
Q209	–0.5	5.1	1.0
Q212	0.6	0.6	0
Q213	0	0.3	0
Q215	–3.6	–2.4	–4.2
Q221	1.5	5.0	3.3
Q404	(G)2.1	(S)5.0	(D)2.5

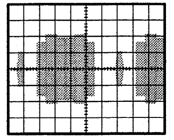
	1	2	3	4	5	6
Q201	5.0	–0.8	–1.4	1.3	0.7	–1.3
Q202	5.0	0.1	0.1	1.2	1.3	0.7
Q203	5.0	1.2	1.8	–5.3	1.8	1.1
Q204	5.1	1.7	2.2	–5.3	2.2	1.6
Q210	5.1	0	0.6	–5.3	0.6	0.3
Q211	–1.8	–1.8	0.5	1.1	0.4	
Q214	5.1	–0.5	–1.8	–2.4	–1.8	
Q216	2.4	2.4	1.8	5.1	–0.7	–1.3
Q217	–0.3	–0.3	–0.9	5.1	–3.1	–3.7
Q219	4.3	4.3	3.7	5.1	–3.0	–3.6
Q220	–5.3	4.8	5.0	0.4	–1.4	–0.8

< WAVEFORM > MAIN BOARD (4/6)

1. 10 µs/DIV, 0.5 V/DIV



2. 10 µs/DIV, 0.5 V/DIV



Note: The value indicated in the schematic diagram should be read as follows:

☐☐☐
- Multiplier (0 - 5)
- 2nd. Significant Digit (0 - 9)
- 1st. Significant Digit (1 - 9)

<Example>

For Resistor:

330 ➡ $33 \times 10^0 = 33\,\Omega$
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123 ➡ $12 \times 10^3 = 12k\,\Omega$
0R00 = $0\,\Omega$

For Capacitor
(Except Electrolytic Capacitor and Tantalum Capacitor):

820 ➡ $82 \times 10^0 =$ 82 pF
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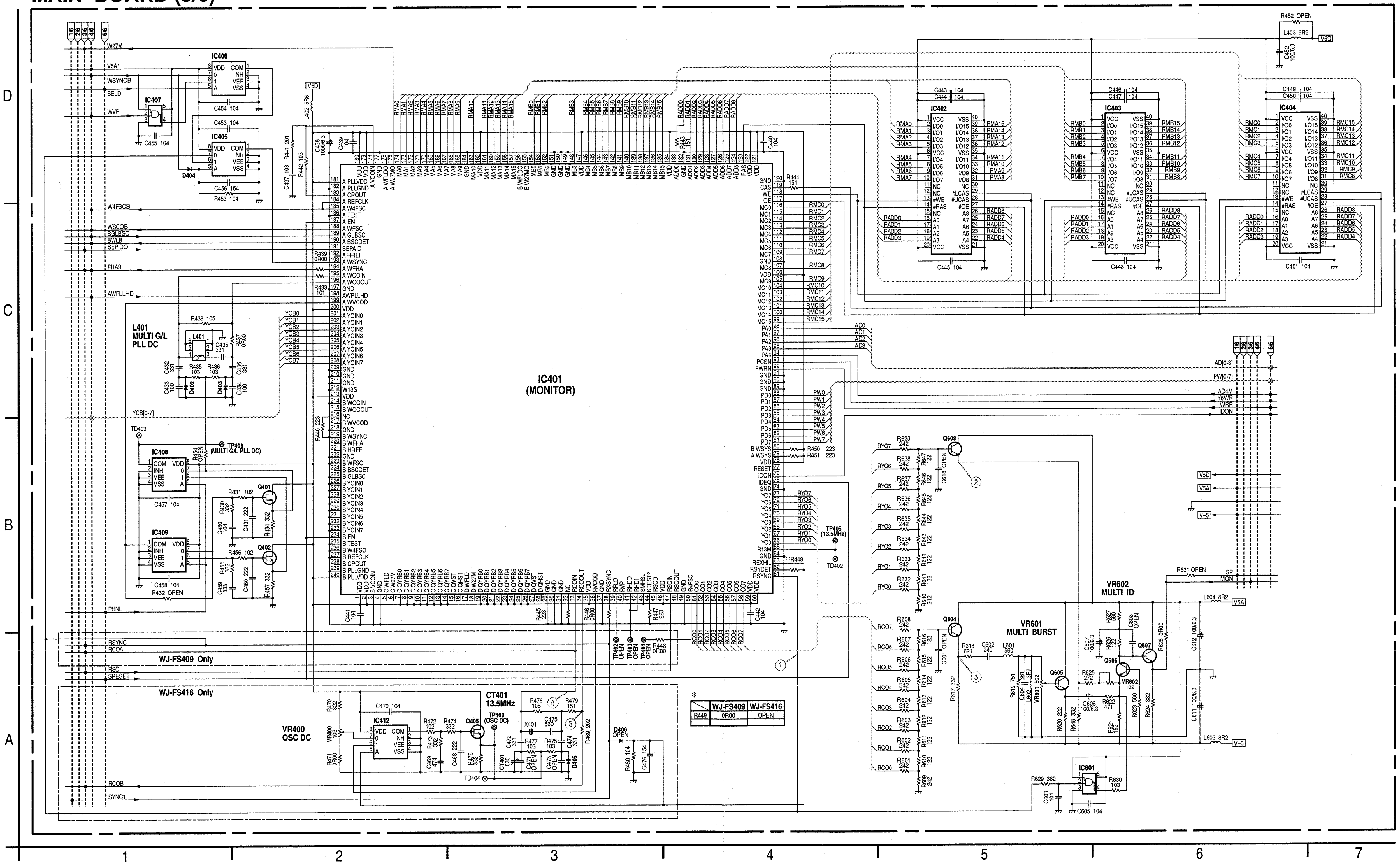
8R2 ➡ $8.2 \times 10^0 =$ 8.2 µH
101 ➡ $10 \times 10^1 =$ 100 µH

< INDEX > MAIN BOARD (4/6)

IC200	D3
IC201	D3
IC202	C4
IC203	A3,B2,B3
IC204	B2
IC205	B2,B3
IC206	B3
IC209	A1
IC210	A2
IC211	A2
IC212	A2,A3
IC213	A3
IC214	A3
IC400	C5
IC410	A5
IC411	B5
Q200	D1
Q201	D1
Q202	D2
Q203	D2
Q204	D2
Q205	D2
Q206	D1
Q209	D2
Q210	C3
Q211	C3
Q212	C3
Q213	C3
Q214	D2
Q215	C2
Q216	C1
Q217	C2
Q219	C2
Q220	B1
Q221	B3
Q403	B5
Q404	A5
D400	B5
D401	B4

SCHEMATIC DIAGRAM OF MAIN BOARD (5/6)

MAIN BOARD (5/6)


D
C
B
A
1
2
3
4
5
6
7
IC401
(MONITOR)
IC402
IC403
IC404
IC405
IC406
IC407
IC408
IC409
IC412
IC601
L401
MULTI G/L
PLL DC
TP406
(MULTI G/L PLL DC)
VR400
OSC DC
CT401
13.5MHz
TP408
(OSC DC)
TP405
(13.5MHz)
VR601
MULTI BURST
VR602
MULTI ID
WJ-FS409 Only
WJ-FS416 Only
W27M
V5A1
WSYNCB
SELD
WVP
W4FSCB
WSCOB
BGLBSC
BWLB
SEPIDO
FHAB
AWPLLHD
YCB[0-7]
PHNL
RSYNC
RCOA
HSC
SRESET
RCOB
SYNC1
AD[0-3]
PW[0-7]
AD4M
Y6WR
WRR
IDON
V5D
V5A
V-5
SP
MON
TD402
TD403
TD404
R452 OPEN
L403 8R2
R631 OPEN
L604 8R2
L603 8R2

*

	WJ-FS409	WJ-FS416
R449	0R00	OPEN

< VOLTAGE >
MAIN BOARD (5/6)

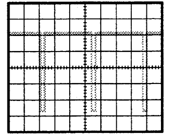
	IC405	IC406	IC408
Pin 1	4.6	4.6	2.3
2	0	0	0
3	0	0	0
4	0	0	0
5	4.6	0	0
6	4.6	4.6	0.5
7	4.6	4.6	2.3
8	5.0	5.0	5.0

	IC409	IC412	IC601
Pin 1	2.0	2.1	5.1
2	0	0	4.6
3	0	0	0
4	0	0	4.7
5	0	0	5.1
6	–	1.3	
7	2.0	2.1	
8	5.0	5.0	

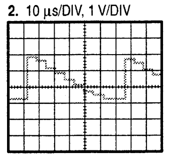
	B	C	E
Q401	(G)2.0	(S)5.0	(D)2.3
Q402	(G)–	(S)5.0	(D)0.5
Q405	(G)2.1	(S)5.0	(D)2.5
Q604	2.5	5.1	1.9
Q605	0	5.1	–0.6
Q606	0	2.0	–0.6
Q607	2.0	5.1	1.3
Q608	1.0	5.1	0.4

< WAVEFORM >
MAIN BOARD (5/6)

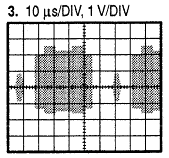
1. 20 µs/DIV, 1 V/DIV



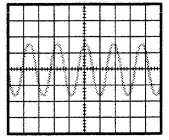
2. 10 µs/DIV, 1 V/DIV



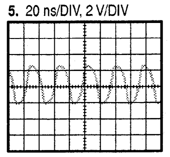
3. 10 µs/DIV, 1 V/DIV



4. 20 ns/DIV, 1 V/DIV



5. 20 ns/DIV, 2 V/DIV



< INDEX >
MAIN BOARD (5/6)

IC401	C3	IC412	A2 for **WJ-FS416**	Q401	B2	D402	C1
IC402	D5	IC601	A5	Q402	B2	D403	C1
IC403	D6			Q405	A3 for **WJ-FS416**	D404	D1
IC404	D6			Q604	B5	D405	A3 for **WJ-FS416**
IC405	D1			Q605	A5		
IC406	D1			Q606	A6		
IC407	D1			Q607	A6		
IC408	B1			Q608	A5		
IC409	B1						

Note: The value indicated in the schematic diagram should be read as follows:

☐☐☐
- Multiplier (0 - 5)
- 2nd. Significant Digit (0 - 9)
- 1st. Significant Digit (1 - 9)

<Example>

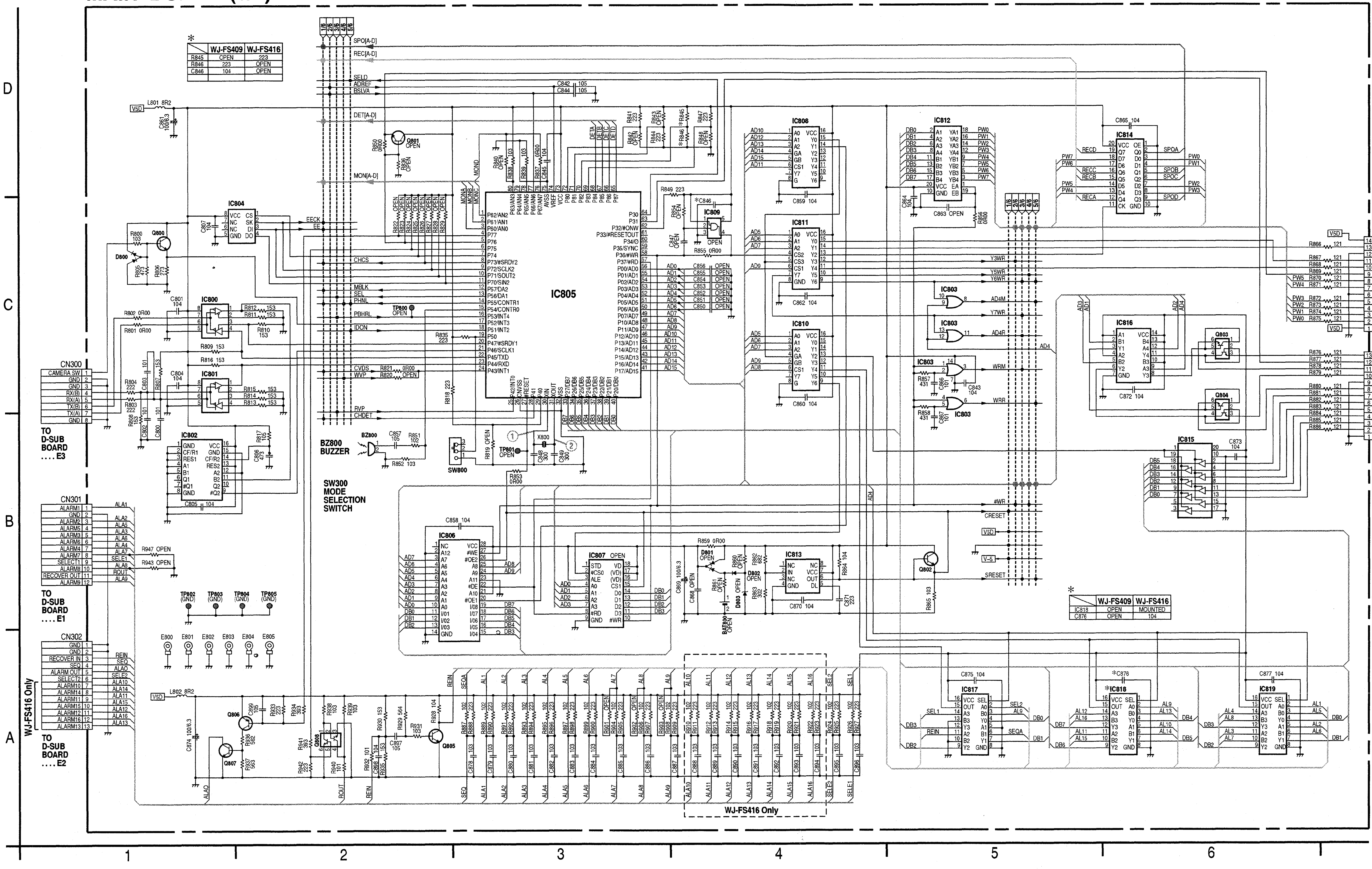
For Resistor:
330 ➡ 33 x 10^0 = 33 Ω
561 ➡ 56 x 10^1 = 560 Ω
123 ➡ 12 x 10^3 = 12k Ω
0R00 = 0 Ω

For Capacitor
(Except Electrolytic Capacitor and Tantalum Capacitor):
820 ➡ 82 x 10^0 = 82 pF
102 ➡ 10 x 10^2 = 1000 pF = 0.001 µF
104 ➡ 10 x 10^4 = 100000 pF = 0.1 µF

For Coil:
010 ➡ 1 x 10^0 = 1 µH
8R2 ➡ 8.2 x 10^0 = 8.2 µH
101 ➡ 10 x 10^1 = 100 µH

SCHEMATIC DIAGRAM OF MAIN BOARD (6/6)

MAIN BOARD (6/6)



< VOLTAGE >
MAIN BOARD (6/6)

	IC800	IC801	IC802	IC803	IC804
Pin 1	0.1	5.0	0	4.9	0
2	0.4	0.3	0	4.9	–
3	0	0.3	0	5.0	–
4	5.0	0.3	0	4.9	1.5
5	0	0	0	4.9	0
6	2.4	3.9	0	5.0	–
7	2.4	0.8	5.0	0	–
8	5.0	5.0	0	5.0	5.0
9			5.0	4.4	
10			0	5.0	
11			0.1	5.0	
12			0	4.4	
13			5.0	5.0	
14			4.6	5.0	
15			0		
16			5.0		

	IC806	IC808	IC810	IC811
Pin 1	–	0.5	4.5	4.5
2	0	4.3	0.5	0.5
3	0.6	0.3	0.6	0.6
4	0.5	0.5	5.0	4.9
5	4.5	0.6	4.3	5.0
6	4.4	0.5	0.6	4.3
7	2.3	5.0	5.0	5.0
8	2.3	0	0	0
9	2.6	5.0	5.0	5.0
10	2.5	5.0	5.0	5.0
11	1.7	5.0	5.0	5.0
12	1.2	5.0	5.0	5.0
13	0.7	5.0	5.0	5.0
14	0	5.0	5.0	5.0
15	0.6	5.0	5.0	5.0
16	1.2	5.0	5.0	5.0
17	1.1			
18	1.1			
19	0.5			
20	5.0			
21	5.0			
22	2.7			
23	0			
24	4.3			
25	0.6			
26	4.4			
27	4.9			
28	5.0			

	IC812	IC813	IC814	IC815	IC816	IC817
Pin 1	4.9	–	0	5.0	5.1	4.4
2	4.9	1.5	0	0	2.6	5.1
3	4.8	–	3.0	0.9	2.7	5.1
4	1.2	0	3.0	0	5.1	1.7
5	4.8	1.2	0	0.8	2.3	0
6	0.7	5.0	0	0	2.3	5.1
7	3.0	5.0	3.0	1.7	0	1.2
8	0.6	–	3.0	0	4.6	0
9	3.0		0	1.2	4.4	0.7
10	0		0	0	5.1	0
11	1.2		5.0	0	2.3	0
12	3.0		0	0.7	2.3	0.6
13	1.1		3.0	0	5.1	0
14	3.0		3.0	0.6	5.1	5.1
15	1.1		0	0		5.0
16	3.0		0	1.2		5.1
17	0.5		4.8	0		
18	3.0		4.8	1.1		
19	4.9		0	5.0		
20	5.0		5.0	5.1		

	IC818	IC819
Pin 1	4.4	4.4
2	5.1	5.1
3	5.1	5.1
4	1.2	1.7
5	5.1	5.1
6	5.1	5.1
7	1.1	1.2
8	0	0
9	1.1	0.7
10	5.1	5.1
11	5.1	5.1
12	0.5	0.6
13	5.1	5.1
14	5.1	5.1
15	5.0	5.0
16	5.1	5.1

	B	C	E
Q800	0	5.0	0
Q802	5.0	5.0	4.4
Q805	0.6	0	0
Q806	5.1	5.1	0
Q807	0	–	0

	Q803	Q804	Q805
1	4.6	2.7	0.7
2	2.3	2.3	0.7
3	2.4	2.3	0
4	2.3	2.3	0
5	4.6	2.7	0
6	4.1	2.9	0

Note: The value indicated in the schematic diagram should be read as follows:

☐☐☐
- Multiplier (0 - 5)
- 2nd. Significant Digit (0 - 9)
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<Example>

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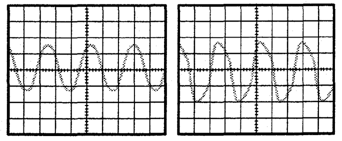
101 ➡ 10 x 10^1 = 100 µH

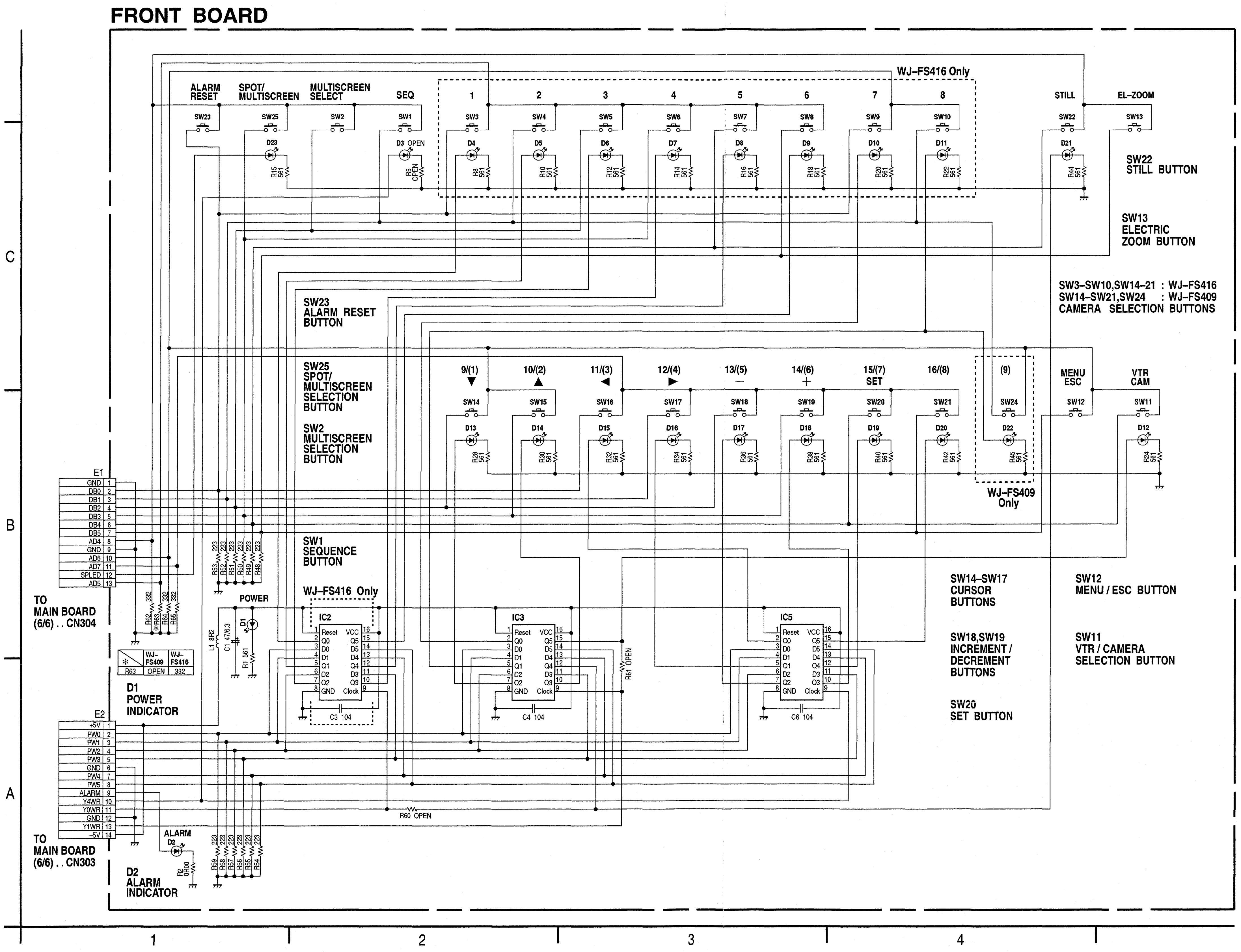
< INDEX >
MAIN BOARD (6/6)

IC800	C1	IC812	D5	Q800	C1
IC801	C1	IC813	B4	Q802	B5
IC802	B1	IC814	D6	Q803	C6
IC803	C5	IC815	B6	Q804	C6
IC804	C2	IC816	C6	Q805	A2
IC805	C3	IC817	A5	Q806	A2
IC806	B3	IC818	A6	Q807	A1
IC808	D4		for **WJ-FS416**	Q808	A2
IC810	C4	IC819	A6		
IC811	C4			D800	C1

< WAVEFORM > MAIN BOARD (6/6)


1. 50 ns/DIV, 1 V/DIV
2. 50 ns/DIV, 1 V/DIV

SCHEMATIC DIAGRAM OF FRONT BOARD


FRONT BOARD
WJ-FS416 Only
ALARM RESET
SPOT/ MULTISCREEN
MULTISCREEN SELECT
SEQ
1
2
3
4
5
6
7
8
STILL
EL-ZOOM
SW23
SW25
SW2
SW1
SW3
SW4
SW5
SW6
SW7
SW8
SW9
SW10
SW22
SW13
D23
D3 OPEN
D4
D5
D6
D7
D8
D9
D10
D11
D21
R15 561
R5 OPEN
R8 561
R10 561
R12 561
R14 561
R16 561
R18 561
R20 561
R22 561
R44 561
SW22 STILL BUTTON
SW13 ELECTRIC ZOOM BUTTON
SW3–SW10,SW14–21 : WJ–FS416
SW14–SW21,SW24 : WJ–FS409
CAMERA SELECTION BUTTONS
SW23 ALARM RESET BUTTON
SW25 SPOT/ MULTISCREEN SELECTION BUTTON
SW2 MULTISCREEN SELECTION BUTTON
9/(1) ▼
10/(2) ▲
11/(3) ◀
12/(4) ▶
13/(5) –
14/(6) +
15/(7) SET
16/(8)
(9)
MENU ESC
VTR CAM
SW14
SW15
SW16
SW17
SW18
SW19
SW20
SW21
SW24
SW12
SW11
D13
D14
D15
D16
D17
D18
D19
D20
D22
D12
R28 561
R30 561
R32 561
R34 561
R36 561
R38 561
R40 561
R42 561
R45 561
R24 561
WJ–FS409 Only
E1
GND 1
DB0 2
DB1 3
DB2 4
DB3 5
DB4 6
DB5 7
AD4 8
GND 9
AD6 10
AD7 11
SPLED 12
AD5 13
TO MAIN BOARD (6/6) . . CN304
R53 223
R52 223
R51 223
R50 223
R49 223
R48 223
R62 332
*R63 332
R64 332
R65 332
* | WJ–FS409 | WJ–FS416
R63 | OPEN | 332
SW1 SEQUENCE BUTTON
WJ–FS416 Only
POWER
L1 8R2
C1 47/6.3
D1
R1 561
D1 POWER INDICATOR
IC2
IC3
IC5
1 Reset
2 Q0
3 D0
4 D1
5 Q1
6 D2
7 Q2
8 GND
VCC 16
Q5 15
D5 14
D4 13
Q4 12
D3 11
Q3 10
Clock 9
C3 104
C4 104
C6 104
R61 OPEN
R60 OPEN
SW14–SW17 CURSOR BUTTONS
SW18,SW19 INCREMENT / DECREMENT BUTTONS
SW20 SET BUTTON
SW12 MENU / ESC BUTTON
SW11 VTR / CAMERA SELECTION BUTTON
E2
+5V 1
PW0 2
PW1 3
PW2 4
PW3 5
GND 6
PW4 7
PW5 8
ALARM 9
Y4WR 10
Y0WR 11
GND 12
Y1WR 13
+5V 14
TO MAIN BOARD (6/6) . . CN303
ALARM
D2
R2 0R00
D2 ALARM INDICATOR
R59 223
R58 223
R57 223
R56 223
R55 223
R54 223
A
B
C
1
2
3
4

< INDEX >
WJ-FS416
FRONT BOARD

IC2	A2/B2
IC3	A2/B2
IC5	A3/B3
D1	B1
D2	A1
D4	C2
D5	C2
D6	C3
D7	C3
D8	C3
D9	C3
D10	C4
D11	C4
D12	B5
D13	B2
D14	B2
D15	B3
D16	B3
D17	B3
D18	B3
D19	B4
D20	B4
D21	C4
D23	C1 .

< INDEX >
WJ-FS409
FRONT BOARD

IC3	A2/B2
IC5	A3/B3
D1	B1
D2	A1
D12	B5
D13	B2
D14	B2
D15	B3
D16	B3
D17	B3
D18	B3
D19	B4
D20	B4
D21	C4
D22	B4
D23	C1

< VOLTAGE >
FRONT BOARD

	IC2	IC3	IC5
Pin 1	5.0	5.0	5.0
2	4.9	0	0
3	4.9	0	0
4	2.0	2.0	2.0
5	0	0	0
6	2.0	2.0	2.0
7	0	0	0
8	0	0	0
9	5.0	5.0	5.0
10	0	0	0
11	2.0	2.0	2.0
12	0	0	0
13	2.0	0	2.0
14	2.0	2.0	2.0
15	0	0	0
16	5.0	5.0	5.0

Note: The value indicated in the schematic diagram should be read as follows:

□□□
Multiplier (0 - 5)
2nd. Significant Digit (0 - 9)
1st. Siginificant Digit (1 - 9)

<Example>

For Resistor:
330 ➡ 33×10^0 = 33 Ω
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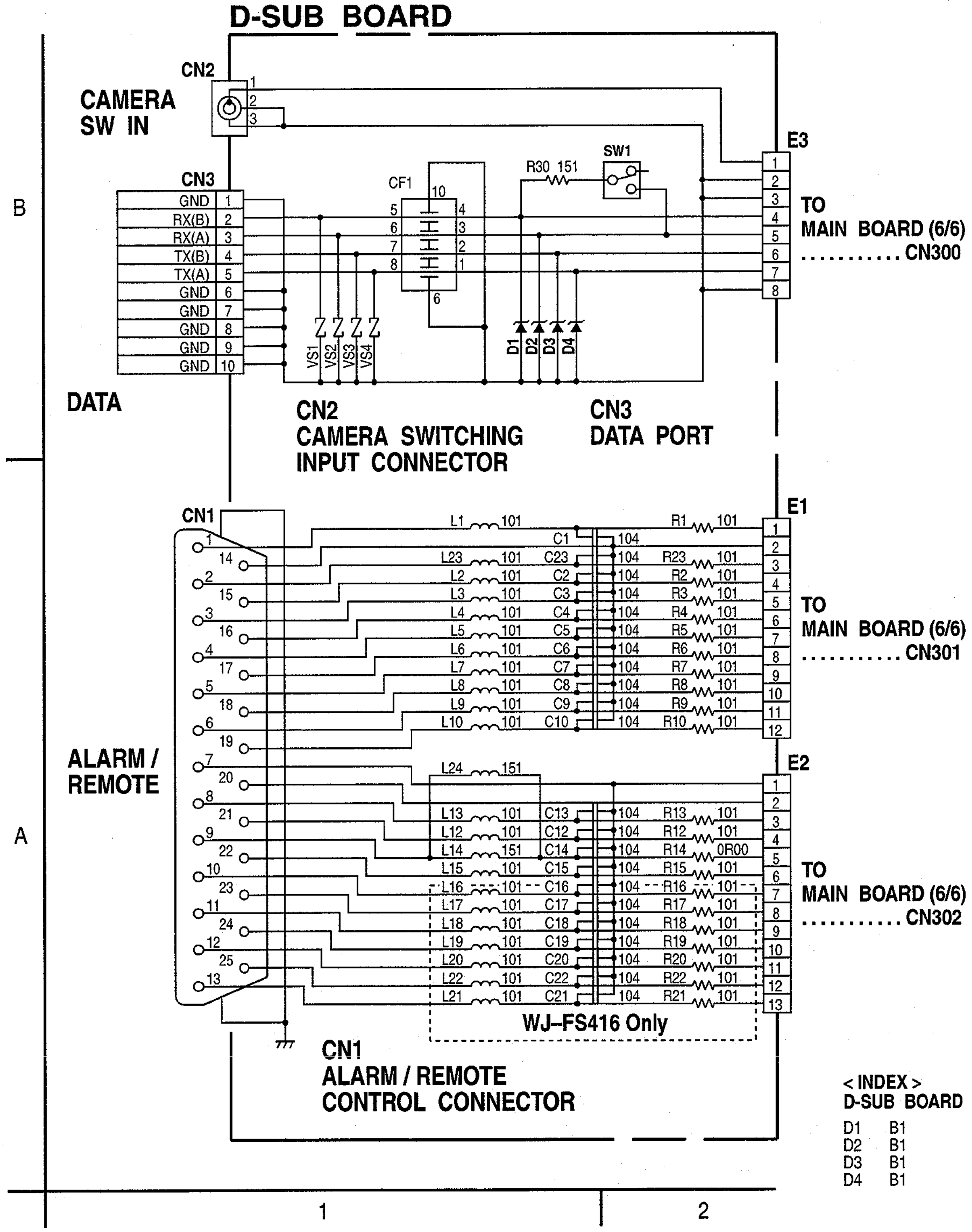
8R2 ➡ 8.2×10^0 = 8.2 µH
101 ➡ 10×10^1 = 100 µH

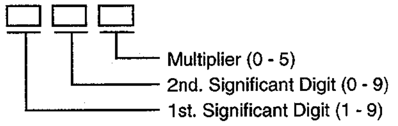
SCHEMATIC DIAGRAM OF D-SUB BOARD


D-SUB BOARD
CN2
CAMERA SW IN
1
2
3
CN3
GND 1
RX(B) 2
RX(A) 3
TX(B) 4
TX(A) 5
GND 6
GND 7
GND 8
GND 9
GND 10
CF1
10
5 4
6 3
7 2
8 1
6
VS1
VS2
VS3
VS4
R30 151
SW1
D1
D2
D3
D4
E3
TO MAIN BOARD (6/6) CN300
DATA
CN2 CAMERA SWITCHING INPUT CONNECTOR
CN3 DATA PORT
B
CN1
E1
L1 101
C1
104
R1 101
L23 101
C23
R23
L2 101
C2
R2
L3 C3 R3
L4 C4 R4
L5 C5 R5
L6 C6 R6
L7 C7 R7
L8 C8 R8
L9 C9 R9
L10 C10 R10
TO MAIN BOARD (6/6) CN301
ALARM / REMOTE
A
E2
L24 151
L13 101 C13 104 R13 101
L12 101 C12 104 R12 101
L14 151 C14 104 R14 0R00
L15 101 C15 104 R15 101
L16 101 C16 104 R16 101
L17 101 C17 104 R17 101
L18 101 C18 104 R18 101
L19 101 C19 104 R19 101
L20 101 C20 104 R20 101
L22 101 C22 104 R22 101
L21 101 C21 104 R21 101
TO MAIN BOARD (6/6) CN302
WJ-FS416 Only
CN1 ALARM / REMOTE CONTROL CONNECTOR
1
2

< INDEX >
D-SUB BOARD

D1	B1
D2	B1
D3	B1
D4	B1

Note: The value indicated in the schematic diagram should be read as follows:


Multiplier (0 - 5)
2nd. Significant Digit (0 - 9)
1st. Significant Digit (1 - 9)

<Example>

For Resistor:
330 ➡ 33 x 10^0 = 33 Ω
561 ➡ 56 x 10^1 = 560 Ω
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0R00 = 0 Ω

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For Capacitor
(Except Electrolytic Capacitor and Tantalum Capacitor):
820 ➡ 82 x 10^0 = 82 pF
102 ➡ 10 x 10^2 = 1000 pF = 0.001 µF
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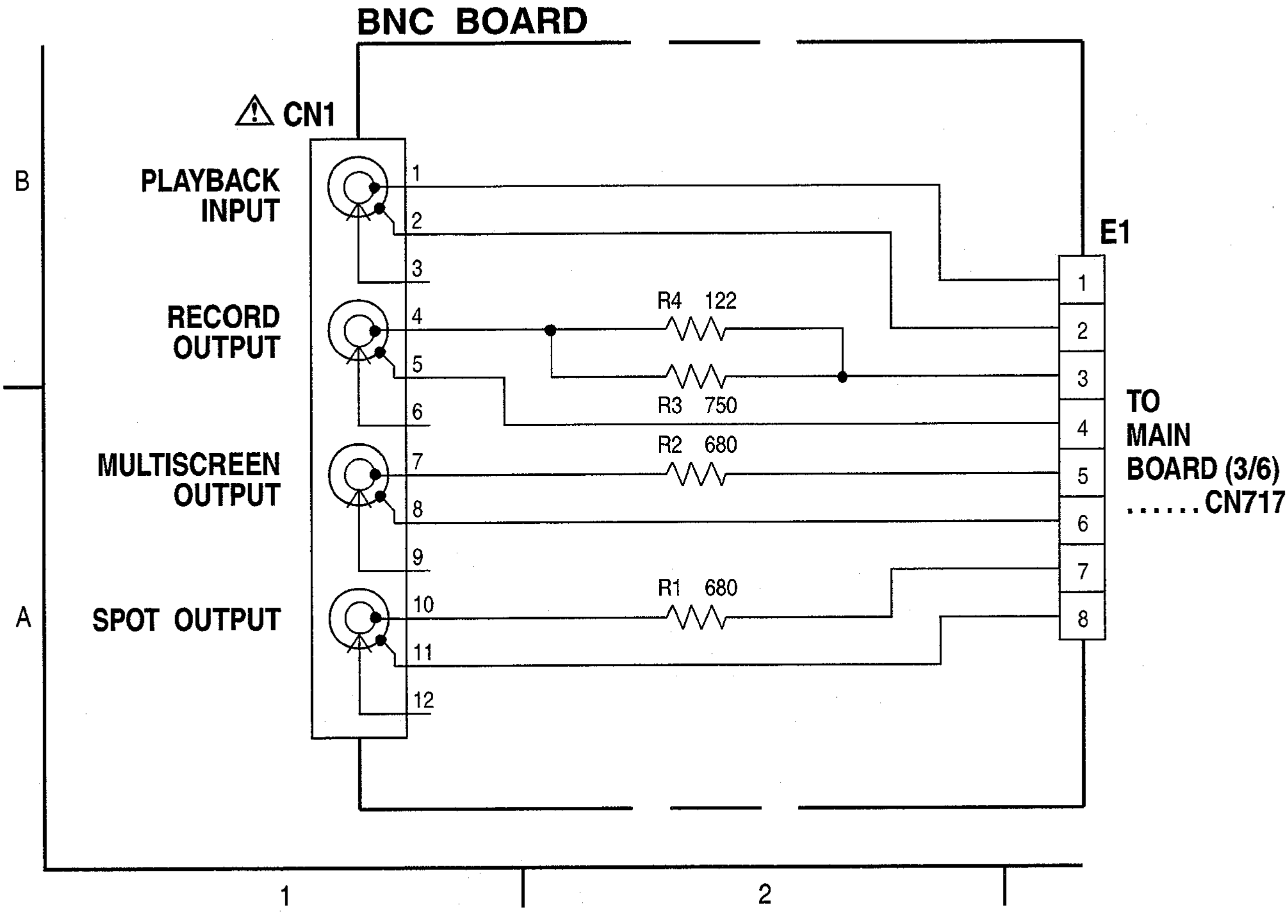
SCHEMATIC DIAGRAM OF BNC BOARD


BNC BOARD
⚠ CN1
PLAYBACK INPUT
RECORD OUTPUT
MULTISCREEN OUTPUT
SPOT OUTPUT
1
2
3
4
5
6
7
8
9
10
11
12
R4 122
R3 750
R2 680
R1 680
E1
TO MAIN BOARD (3/6) CN717
B
A

Important safety notice
Components Identified by " ⚠ " mark have special characteristics for safety.
When replacing any of these components, use only manufacturer's specified parts.

Note: The value indicated in the schematic diagram should be read as follows:

□□□
- Multiplier (0 - 5)
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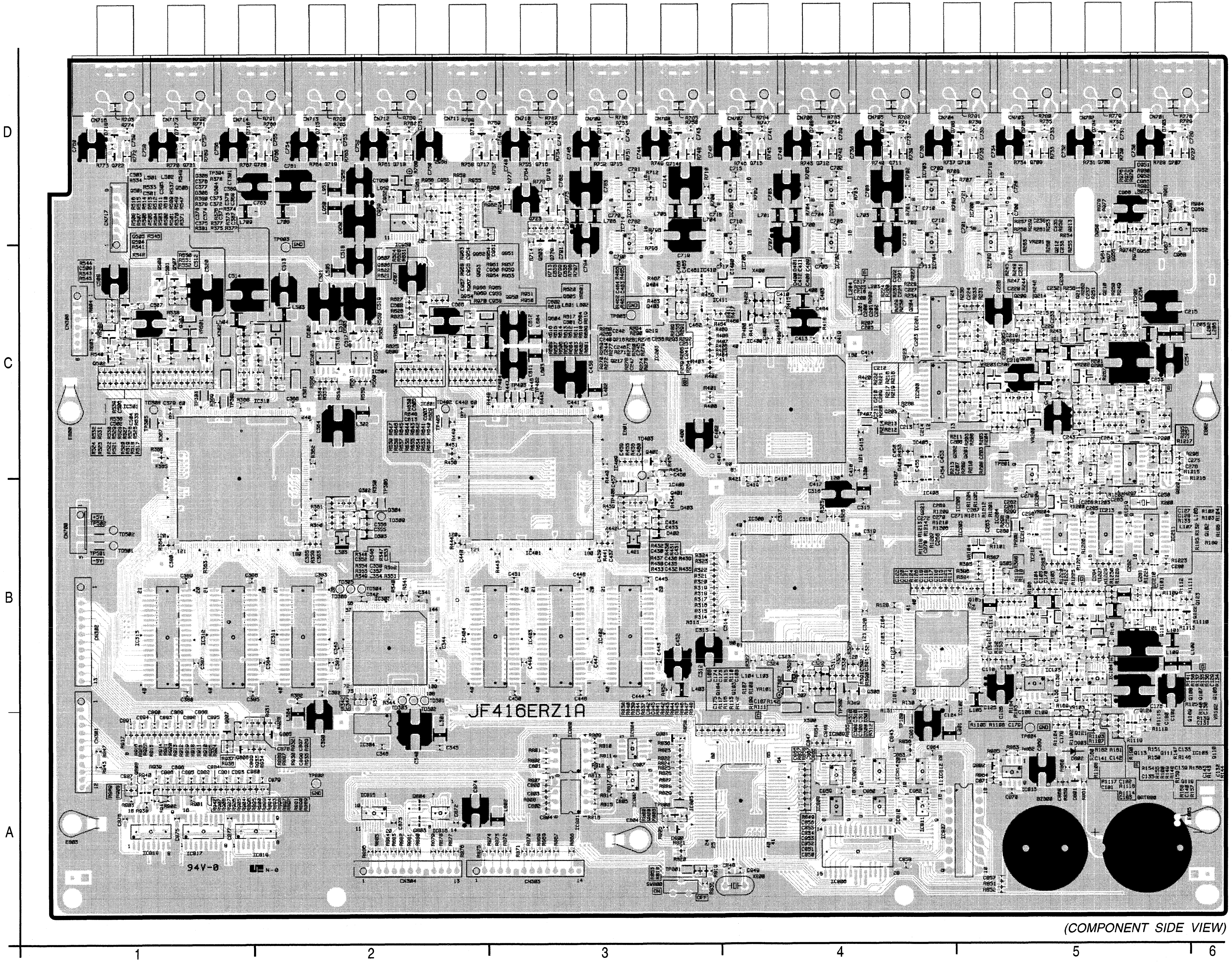
<Example>

For Resistor:

330 ➡ $33 \times 10^0 = 33\,\Omega$
561 ➡ $56 \times 10^1 = 560\,\Omega$
123 ➡ $12 \times 10^3 = 12\text{k}\,\Omega$
0R00 = $0\,\Omega$

CONDUCTOR VIEW OF MAIN BOARD OF WJ-FS409

MAIN BOARD



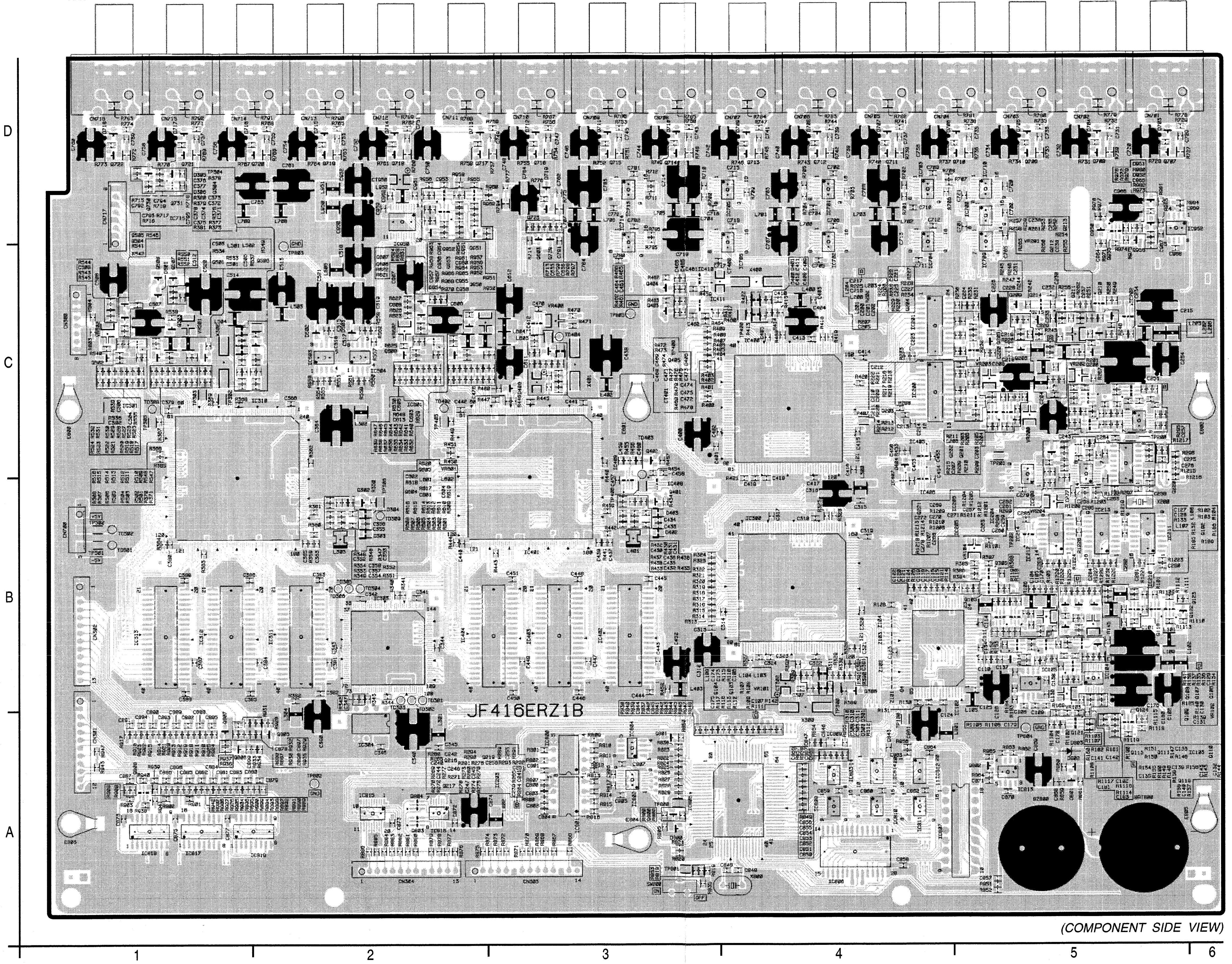
(COMPONENT SIDE VIEW)

< INDEX >
MAIN BOARD

IC710	D5
IC102	B4
IC103	B5
IC104	B5
IC105	B5
IC200	C4
IC201	C4
IC202	C5
IC203	C5
IC204	C5
IC205	B5
IC206	C5
IC209	B5
IC210	B5
IC211	B5
IC212	B5
IC213	B5
IC214	B5
IC300	B4
IC303	B2
IC304	A2
IC310	C1
IC311	B2
IC312	B1
IC313	B1
IC400	C4
IC401	B3
IC402	B3
IC403	B3
IC404	B3
IC405	C4
IC406	B4
IC407	B4
IC408	B3
IC409	C3
IC501	C1
IC503	C2
IC504	C2
IC601	C2
IC700	D5
IC701	D4
IC703	D4
IC705	D4
IC709	D4
IC713	D3
IC714	D3
IC800	A3
IC801	A3
IC802	A3
IC803	A4
IC804	A3
IC805	A3
IC806	A4
IC807	A4
IC808	A4
IC809	A4
IC810	A4
IC811	A4
IC812	A4
IC813	A5
IC814	A4
IC816	A2
IC817	A1
IC819	A1
IC950	D2
IC952	D5
Q102	B5
Q103	B5
Q104	B5
Q105	B5
Q106	B5
Q107	B5
Q108	B5
Q109	B5
Q110	B5
Q111	B5
Q113	B5
Q114	B5
Q118	B5
Q119	B5
Q121	A5
Q122	B5
Q123	B5
Q124	A5
Q200	C5
Q201	C5
Q202	C5
Q203	C5
Q204	C4
Q205	C5
Q206	C5
Q209	C5
Q210	C5
Q211	C5
Q212	C5
Q213	C5
Q214	C5
Q215	C5
Q216	C5
Q217	C5
Q219	C5
Q220	B5
Q221	C5
Q302	B2
Q304	D1
Q305	B5
Q306	B4
Q401	B3
Q402	C3
Q404	C3
Q501	C1
Q502	C1
Q503	C1
Q504	C1
Q505	C1
Q506	C1
Q507	C1
Q508	C1
Q603	D3
Q604	C2
Q605	C2
Q606	C2
Q607	C2
Q608	C2
Q707	D5
Q708	D5
Q709	D5
Q710	D5
Q711	D4
Q712	D4
Q713	D4
Q714	D3
Q715	D3
Q723	D3
Q729	D3
Q800	A3
Q801	A3
Q802	A3
Q803	A2
Q804	A2
Q805	A2
Q806	A1
Q807	A1
Q808	A1
Q950	D2
Q951	D2
Q952	D2
Q953	D2
Q954	D2
Q955	D5
Q956	C5
D300	B4
D301	B4
D303	B2
D304	B2
D305	C1
D306	C1
D400	C4
D401	C4
D402	B3
D403	B3
D404	C4
D501	C1
D502	C2
D503	C2
D703	D5
D704	D5
D705	D5
D706	D4
D707	D4
D708	D4
D709	D4
D710	D3
D711	D3
D719	D3
D800	A3
D801	A5
D802	A5
D803	A5
D950	D5
D951	D5
D952	D5

CONDUCTOR VIEW OF MAIN BOARD OF WJ-FS416

MAIN BOARD



(COMPONENT SIDE VIEW)

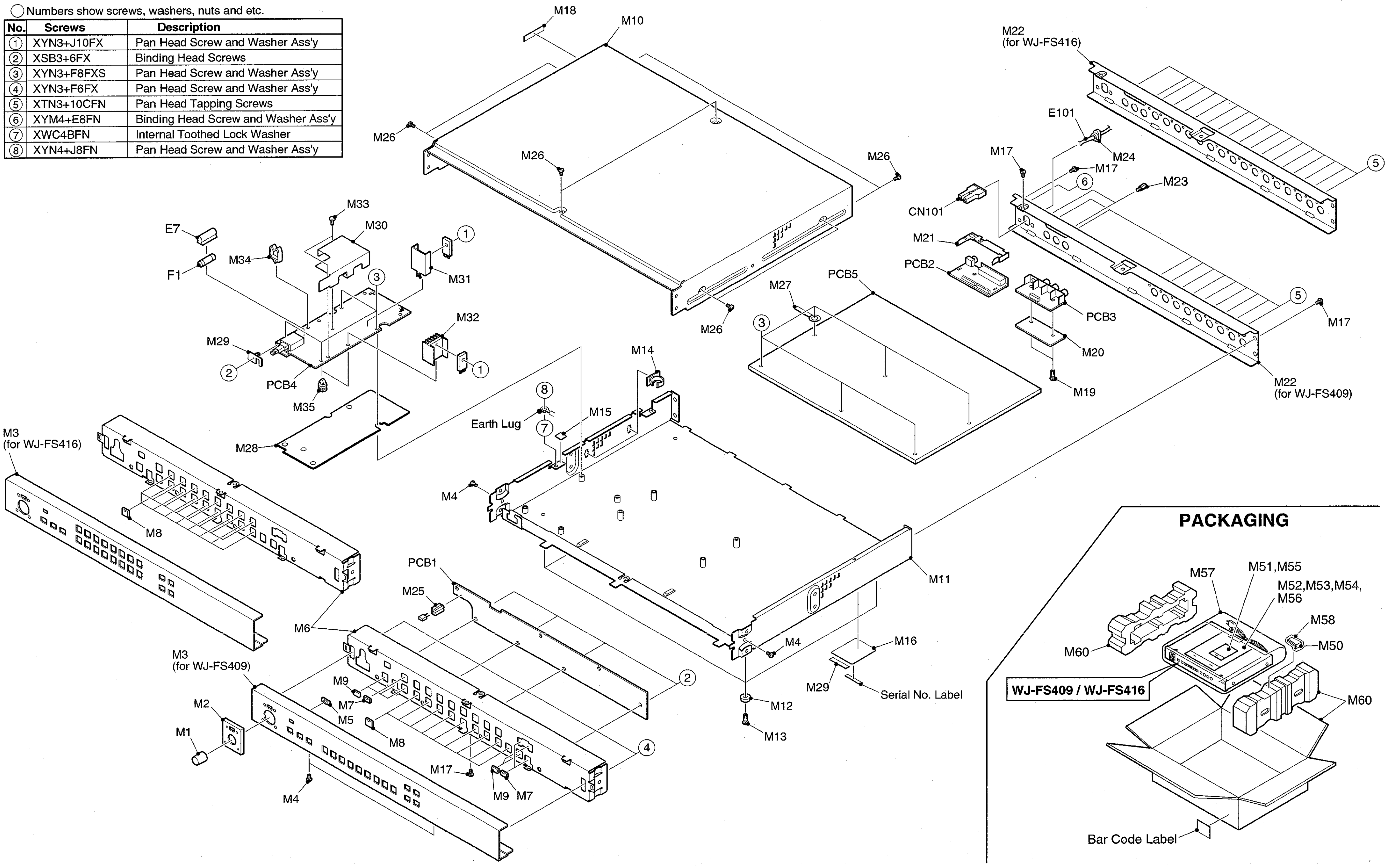
< INDEX >
MAIN BOARD

IC702	C4
IC704	C4
IC706	C4
IC818	A1
IC102	B4
IC103	B5
IC104	B5
IC105	B5
IC200	C4
IC201	C4
IC202	C5
IC203	C5
IC204	C5
IC205	B5
IC206	C5
IC209	B5
IC210	B5
IC211	B5
IC212	B5
IC213	B5
IC214	B5
IC300	B4
IC303	B2
IC304	A2
IC310	C1
IC311	B2
IC312	B1
IC313	B1
IC400	C4
IC401	B3
IC402	B3
IC403	B3
IC404	B3
IC405	C4
IC406	B4
IC407	B4
IC408	B3
IC409	C3
IC410	C3
IC411	C3
IC412	C3
IC501	C1
IC503	C2
IC504	C2
IC601	C2
IC700	D5
IC701	D4
IC703	D4
IC705	D4
IC709	D4
IC713	D3
IC714	D3
IC715	D1
IC800	A3
IC801	A3
IC802	A3
IC803	A4
IC804	A3
IC805	A3
IC806	A4
IC807	A4
IC808	A4
IC809	A4
IC810	A4
IC811	A4
IC812	A4
IC813	A5
IC814	A4
IC815	A2
IC816	A2
IC817	A1
IC819	A1
IC950	D2
IC952	D5
Q102	B5
Q103	B5
Q104	B5
Q105	B5
Q106	B5
Q107	B5
Q108	B5
Q109	B5
Q110	B5
Q111	B5
Q113	B5
Q114	B5
Q118	B5
Q119	B5
Q121	A5
Q122	B5
Q123	B5
Q124	A5
Q200	C5
Q201	C5
Q202	C5
Q203	C5
Q204	C4
Q205	C5
Q206	C5
Q209	C5
Q210	C5
Q211	C5
Q212	C5
Q213	C5
Q214	C5
Q215	C5
Q216	C5
Q217	C5
Q219	C5
Q220	B5
Q221	C5
Q302	B2
Q304	D1
Q305	B5
Q306	B4
Q401	B3
Q402	C3
Q403	C3
Q404	C3
Q405	C3
Q501	C1
Q502	C1
Q503	C1
Q504	C1
Q505	C1
Q506	C1
Q507	C1
Q508	C1
Q603	D3
Q604	C2
Q605	C2
Q606	C2
Q607	C2
Q608	C2
Q707	D5
Q708	D5
Q709	D5
Q710	D5
Q711	D4
Q712	D4
Q713	D4
Q714	D3
Q715	D3
Q716	D3
Q717	D2
Q718	D2
Q719	D2
Q720	D2
Q721	D1
Q722	D1
Q723	D3
Q729	D3
Q730	D1
Q731	D1
Q800	A3
Q801	A3
Q802	A3
Q803	A2
Q804	A2
Q805	A2
Q806	A1
Q807	A1
Q808	A1
Q950	D2
Q951	D2
Q952	D2
Q953	D2
Q954	D2
Q955	D5
Q956	C5
D300	B4
D301	B4
D303	B2
D304	B2
D305	C1
D306	C1
D400	C4
D401	C4
D402	B3
D403	B3
D404	C4
D405	C3
D501	C1
D502	C2
D503	C2
D703	D5
D704	D5
D705	D5
D706	D4
D707	D4
D708	D4
D709	D4
D710	D3
D711	D3
D712	D3
D713	D2
D714	D2
D715	D2
D716	D1
D717	D1
D718	D1
D719	D3
D800	A3
D801	A5
D802	A5
D803	A5
D950	D5
D951	D5
D952	D5

EXPLODED VIEW

○ Numbers show screws, washers, nuts and etc.

No.	Screws	Description
①	XYN3+J10FX	Pan Head Screw and Washer Ass'y
②	XSB3+6FX	Binding Head Screws
③	XYN3+F8FXS	Pan Head Screw and Washer Ass'y
④	XYN3+F6FX	Pan Head Screw and Washer Ass'y
⑤	XTN3+10CFN	Pan Head Tapping Screws
⑥	XYM4+E8FN	Binding Head Screw and Washer Ass'y
⑦	XWC4BFN	Internal Toothed Lock Washer
⑧	XYN4+J8FN	Pan Head Screw and Washer Ass'y


M18
M10
M22 (for WJ-FS416)
E101
M24
M17
M17
⑥
M23
⑤
CN101
M21
PCB2
PCB3
M20
M19
⑤
M17
M22 (for WJ-FS409)
M26
M26
M26
M26
M33
M30
E7
M34
F1
③
①
M31
M32
①
M29
②
PCB4
M35
M28
M27
PCB5
③
M14
⑧
Earth Lug
⑦
M15
M3 (for WJ-FS416)
M8
M4
M11
M6
PCB1
M25
M6
M3 (for WJ-FS409)
M9
M7
M5
M8
M2
M1
M4
M17
M9
M7
②
④
M4
M16
M29
Serial No. Label
M12
M13
PACKAGING
M57
M51,M55
M52,M53,M54, M56
M58
M50
M60
WJ-FS409 / WJ-FS416
M60
Bar Code Label

REPLACEMENT PARTS LIST

nportant Notice

Components identified by " ⚠ " mark have special characteristics important for safety. When replacing any of these components, use only manufacturer's specified parts.

RTL : Retention Time Limited (No longer available after discontinuing product).

VIDEO MULTIPLEXER WJ-FS409

MISCELLANEOUS

REF. NO.		PART NO.	DESCRIPTION
CN101		YWVAR2	Connector Cover
F1	⚠	XBA2C20ET0A	Current Fuse
E7		YW840522	Fuse Cover
E101	⚠	K2CC3ER00001	Power Cord for WJ-FS409/B
	⚠	YWACF250G	Power Cord for WJ-FS409/G
M1		YWA5RG0141A3	Power Switch Knob
M2	⚠	YWV5CA0504B2	Switch Guard
M3		V5WJ2535A2	Front Panel
M4		YWV1AA1074A4	Standard Screw
M5		YWV1VA0546A3	LED Lens
M6		YWV2KA1267A1	Front Chassis
M7		YWV6JA1156A3	Button
M8		YWV6JA1157A3	Button
M9		YWV6JB1156A3	Button
M10		YWV5EA2355A1	Upper Cover
M11		YWV2KB1233A1	Main Chassis
M12		YWV5LA0067A4	Rubber Foot
M13		YWA2LA0070A4	Joint
M14		YWCKT10V0	Cord Clamp
M15	⚠	YWA7SA0689A4	Earth Mark Label
M16	⚠	V7QA5713A4	Main Label for WJ-FS409/B
	⚠	V7QA5714A4	Main Label for WJ-FS409/G
M17		YWA1AA0272A4	Binding Head Screw
M18		YFV7MB0099A4	Caution Label
M19		YW0920	Tack
M20	⚠	YWV2PA1211A4	Insulator Sheet
M21		YWV2SA4742A3	Mounting Angle for D SUB Board
M22		V5WF2536A2	Rear Panel
M23		JFS2.6SB1WM	Special Screw
M24	⚠	YWSR6W1	Cord Clamp for WJ-FS409/B
	⚠	YWSR5N4	Cord Clamp for WJ-FS409/G
M26		YWA1AA0270A4	Binding Head Screw
M27		YWCS1	Cord Clamp
M28	⚠	YWV2PA1190A3	Insulator Sheet
M29		V7SA4171A4	PS Data Label

FRONT BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB1 (RTL)	JF309PKY1A	Printed Circuit Board Ass'y	
IC3,5	C0JBAF000252	IC	
D1	LN342GP	LED	
D2	B3AAA0000380	LED	
D12-23	LN1361CTR	LED	
R1	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R2	ERJ6GEY0R00	Metal	0 ohm 1/10W
R15,24	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R28,30	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R32,34	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R36,38	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R40,42	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R44,45	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R48-59	ERJ6GEYJ223V	Metal	22K ohms 1/10W
R62	ERJ6GEYJ332V	Metal	3.3K ohms 1/10W
R64,65	ERJ6GEYJ332V	Metal	3.3K ohms 1/10W
C1	EEVHB0J470R	Electrolytic	47 µF 6.3V
C4,6	YF400104FZT	Ceramic	0.1 µF
L1	G1C8R2J00002	Coil	8.2 µH
SW1,2	EVQ11A05R	Push Switch	
SW11-25	EVQ11A05R	Push Switch	
E1	ELY322V513	Wire Ass'y for Main Board CN304	
E2	K1PA14C00001	Wire Ass'y for Main Board CN303	
M25	YWLDS90K	LED Holder	

D-SUB BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB2 (RTL)	JF309PKB1A	Printed Circuit Board Ass'y	
D1-4	MAZ80560ML	Diode	
VS1-4	ERZV07D680	ZNR	
R1-10	ERJ6GEYJ101V	Metal	100 ohms 1/10W
R12,13	ERJ6GEYJ101V	Metal	100 ohms 1/10W
R14	ERJ6GEY0R00	Metal	0 ohm 1/10W
R15,23	ERJ6GEYJ101V	Metal	100 ohms 1/10W
R30	ERJ12YJ151H	Metal	150 ohms 1/2W
C1-10	YF400104FZT	Ceramic	0.1 µF
C12-15	YF400104FZT	Ceramic	0.1 µF
C23	YF400104FZT	Ceramic	0.1 µF
L1-10	G1C101J00002	Coil	100 µH
L12,13	G1C101J00002	Coil	100 µH
L14	G1C151J00001	Coil	150 µH
L15,23	G1C101J00002	Coil	100 µH

REF. NO.	PART NO.	DESCRIPTION	
L24	G1C151J00001	Coil	150 µH
SW1	ESD11V120	Slide Switch	
CF1	YWNFA41R222T	Ceramic Filter	
CN1	YWJBY25S1A3G	25-pin D-sub Connector	
CN2	K2HA101B0004	Jack	
CN3	YWTM11R5C66	Modular Jack	
E1	ATY217V512	Wire Ass'y for Main Board CN301	
E2	K1PA06C00003	Wire Ass'y for Main Board CN302	
E3	ATY314V508	Wire Ass'y for Main Board CN300	

BNC BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB3 (RTL)	JF309PKC1A	Printed Circuit Board Ass'y	
R1,2	D1BD68R00001	Metal	68 ohms 1/10W
R3	YWR1220Q750D	Metal	75 ohms 1/10W
R4	YWR1220P122D	Metal	1.2K ohms 1/10W
CN1 ⚠	K1QBB4AB0007	BNC Connector	
E1	FS116C02A	Wire Ass'y for Main Board CN717	

POWER BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB4 (RTL)	JF116EKY2A	Printed Circuit Board Ass'y	
IC1 ⚠	MIP0224SY	IC	
IC2	YWTA76431S	IC	
Q1 ⚠	YWPC123FY2	Photocoupler	
Q2	2SC2412K-T46	Transistor	
D1 ⚠	YWDB155G	Diode	
D2	YWP6KE180A	Diode	
D3	YWERB3710	Diode	
D4	YWSC2012	Diode	
D21	B0JBQG000001	Diode	
D22	B0JCMG000003	Diode	
VS1 ⚠	ERZV07D471	ZNR	
R4,5	ERJ14YJ334H	Metal	330K ohms 1/4W
R6	ERJ6GEYJ220V	Metal	22 ohms 1/10W
R7,8	YF2116470JT	Metal	47 ohms 1/10W
R9	ERJ6GEYJ4R7V	Metal	4.7 ohms 1/10W
R10	ERG3SJ181P	Metal	180 ohms 3W
R21	YF2116470JT	Metal	47 ohms 1/10W
R22	ERJ6GEYJ332V	Metal	3.3K ohms 1/10W
R23	ERJ6GEYJ102V	Metal	1K ohms 1/10W
R24	ERA6YED682V	Metal	6.8K ohms 1/10W
R25	ERJ6GEYJ391V	Metal	390 ohms 1/10W
R26	ERA6YED682V	Metal	6.8K ohms 1/10W
R27,28	ERJ6GEYJ332V	Metal	3.3K ohms 1/10W
R30	ERJ14YJ101H	Metal	100 ohms 1/4W
C1 ⚠	ECQU2A563MT	Plastic	0.056 µF 100V
C2,3 ⚠	ECKDRS222MEY	Ceramic	2200 pF
C4 ⚠	ECQU2A333MV	Plastic	0.033 µF 100V
C5 ⚠	ECKDRS222MEY	Ceramic	2200 pF
C6,7	EC0S2DA221BB	Electrolytic	220 µF 200V
C8	MCUV1E104KBN	Ceramic	0.1 µF
C9	EEUEB1A101	Electrolytic	100 µF 10V
C10	F1J1C105A004	Ceramic	1 µF
C11,12 ⚠	ECKDRS222MEY	Ceramic	2200 pF
C13	ECKD3D101KBP	Ceramic	100 pF
C21	EEUFC1A272	Electrolytic	2700 µF 10V
C22,23	EEUFC1A471E	Electrolytic	470 µF 10V
C24	EEUFC1A221E	Electrolytic	220 µF 10V
C25	MCUV1E104KBN	Ceramic	0.1 µF
C30	ECKD3D101KBP	Ceramic	100 pF
L21	YWSL810330	Coil	
L22	YWSL675330	Coil	
T1 ⚠	G4D2C0000001	Power Transformer	
SW1 ⚠	YWSDDFA3	Power Switch	
CF1,2 ⚠	YW0R3A333F20	LC Filter	
CN1	YWB2P3VH	3-pin Connector	
E1	YWFS916E01A	Wire Ass'y for Main Board CN700	
E2,3 ⚠	K3GE1BB00004	Fuse Holder	
E5,6	YWMEP1866	Terminal	
E8-11 ⚠	YW811207	Insulator Cover for C2,C3,C11,C12	
M29	YWV2SA4757A4	Mounting Angle for Power Switch	
M30 ⚠	YWV2PA1212A3	Insulator Cover	
M31	YWA7DA0081A4	Heat Sink	
M32	YWV7DA0045A4	Heat Sink	
M33	YWP4050	Tack	
M34	YWUAMS11V0	Cord Clamp	
M35	YW2J08	Support	

MAIN BOARD

REF. NO.	PART NO.	DESCRIPTION
PCB5 (RTL)	JF409EKZ1A	Printed Circuit Board Ass'y
IC102	C1AB00000191	IC
IC103	YWTC4S66FL	IC
IC104	YW74HC04ADTE	IC
IC105	YWNJM4565M	IC
IC200,201	C0FBAD000003	IC
IC202	YWTC4W53FUL	IC
IC203	YW74HC04ADTE	IC
IC204	YWNJM2229M	IC
IC205	YW74HC04ADTE	IC
IC206	YWTC7S00FUL	IC
IC209	74HC4538ADTE	IC
IC210	YWTC7S08FUL	IC
IC211	C0JBAK000129	IC
IC212	C0JBAC000178	IC

EF. NO.	PART NO.	DESCRIPTION
213	C0JBAK000129	IC
214	YWTC7W08FUL	IC
300	YWMVT85038	IC
303	YW6016TC1443	IC
304	C3ZAF0000018	IC
310	C1AB00000368	IC
311-313	C3ABKG000023	IC
400	YWMVT85038	IC
401	C1AB00000368	IC
402-404	C3ABKG000023	IC
405,406	YWTC4W53FUL	IC
407	YWTC7S08FUL	IC
408-411	YWTC4W53FUL	IC
501	YWTC7S08FUL	IC
503,504	YWNJM2244M	IC
601	YWTC7S08FUL	IC
700	C0JBAS000124	IC
701,703	C0JBAS000134	IC
705	C0JBAS000134	IC
709	YW74HC04ADTE	IC
710	C0JBAS000124	IC
713,714	C0JBAS000134	IC
C800,801	C1DA00000163	IC
C802	74HC4538ADTE	IC
C803	MC74AC32DTL	IC
C804	YWBR93LC66RF	IC
C805	C2BBGF000106	IC
C806	C3BBDG000005	IC
C808,810	C0JBAN000139	IC
C811	C0JBAN000139	IC
C812	C0JBAZ000995	IC
C813	C0EBH0000063	IC
IC814	74HC374ADTE	IC
IC815	C0JBAZ000995	IC
IC816	YW74HC08DTE	IC
IC817,819	YWHD74HC257F	IC
IC950	C9ZB00000121	IC
IC952	C0BBBA000023	IC
Q102-104	YWXN0450100L	Transistor
Q105	IMZ1A	Transistor
Q106,107	2SD1819AHL	Transistor
Q108	2SA1226-E3	Transistor
Q109	B1ABBB000072	Transistor
Q110	2SB1218AHL	Transistor
Q111,113	IMZ1A	Transistor
Q114	2SD1819AHL	Transistor
Q118	XN0440100L	Transistor
Q119,121	YWXN0450100L	Transistor
Q122	2SB1218AHL	Transistor
Q123	YWXN0450100L	Transistor
Q124	XN0440100L	Transistor
Q200	2SB1218AHL	Transistor
Q201,202	YWXN0450100L	Transistor
Q203,204	IMZ1A	Transistor
Q205,206	2SD1819AHL	Transistor

REF. NO.	PART NO.	DESCRIPTION	
Q209	B1ABBB000072	Transistor	
Q210	IMZ1A	Transistor	
Q211	XN0140100L	Transistor	
Q212,213	2SD1819AHL	Transistor	
Q214	XN0150100L	Transistor	
Q215	2SD1819AHL	Transistor	
Q216,217	YWXN0450100L	Transistor	
Q219	YWXN0450100L	Transistor	
Q220	XN0440100L	Transistor	
Q221	2SD1819AHL	Transistor	
Q302,304	B1CBBF000007	Transistor	
Q305	IMZ1A	Transistor	
Q306	B1CBBF000007	Transistor	
Q401-404	B1CBBF000007	Transistor	
Q501-506	2SD1819AHL	Transistor	
Q507,508	2SC2411K-T46	Transistor	
Q603	2SB1218AHL	Transistor	
Q604-608	2SD1819AHL	Transistor	
Q707-715	B1ABBB000072	Transistor	
Q723	B1ABBB000072	Transistor	
Q729	2SB1218AHL	Transistor	
Q800,802	2SD1819AHL	Transistor	
Q803,804	YWXN0450100L	Transistor	
Q805	2SD1819AHL	Transistor	
Q806	2SB1218AHL	Transistor	
Q807	2SC2411K-T46	Transistor	
Q808	YWXN0450100L	Transistor	
Q950	2SB1218AHL	Transistor	
Q951,952	YWXN0450100L	Transistor	
Q953	IMZ1A	Transistor	
Q954	2SB1218AHL	Transistor	
Q955	YWXN0450100L	Transistor	
Q956	2SB1218AHL	Transistor	
D300,301	YWHVU359TRF	Diode	
D303,304	YWHVU359TRF	Diode	
D305,306	MA2Z372E0L	Diode	
D400,401	YWHVU359TRF	Diode	
D402,403	MA2Z372E0L	Diode	
D404	B0ACCJ000016	Diode	
D501-503	DA204K-T46	Diode	
D703-711	DA204K-T46	Diode	
D719,800	DA204K-T46	Diode	
D950	B0ACCJ000016	Diode	
D951,952	DA204K-T46	Diode	
R100,101	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R102	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R103	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R104	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R105,106	YWR0816P102D	Metal	1K ohms 1/16W
R107	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R108	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R109	ERJ3GEY0R00	Metal	0 ohm 1/16W
R110	ERJ3GEYJ202V	Metal	2K ohms 1/16W
R111	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R112	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R113	ERJ3GEYJ221V	Metal	220 ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R114	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R115,116	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R117	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R118	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R119	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R121	ERJ3GEYJ750V	Metal	75 ohms 1/16W
R124	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R125	ERJ3GEYJ391V	Metal	390 ohms 1/16W
R126	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R128	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R131	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R132,133	YWR0816P621D	Metal	620 ohms 1/16W
R134	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R135	ERJ3GEYJ333V	Metal	33K ohms 1/16W
R136	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R137	YWR0816P561D	Metal	560 ohms 1/16W
R138	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R139	ERJ3GEYJ151V	Metal	150 ohms 1/16W
R140	YWR0816P222D	Metal	2.2K ohms 1/16W
R141	ERJ3GEY0R00	Metal	0 ohm 1/16W
R142	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R143	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R144	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R145	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R146	YWR0816P153D	Metal	15K ohms 1/16W
R147	YWR0816P162D	Metal	1.6K ohms 1/16W
R148	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R149	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R150	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R151	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R152	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R153-155	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R156	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R157,158	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R159	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R160	ERJ3GEYJ394	Metal	390K ohms 1/16W
R161	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R169	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R183,184	YWR0816P222D	Metal	2.2K ohms 1/16W
R185	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R186	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R189	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R190,200	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R201	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R202	YWR0816P102D	Metal	1K ohms 1/16W
R203	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R204	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R206	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R207	YWR0816P102D	Metal	1K ohms 1/16W
R208	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R209	ERJ3GEYJ391V	Metal	390 ohms 1/16W
R210	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R211	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R212	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R213	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R214	ERJ3GEY0R00	Metal	0 ohm 1/16W
R215	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R216	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R217	ERJ3GEY0R00	Metal	0 ohm 1/16W
R218	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R219	ERJ3GEYJ162V	Metal	1.6K ohms 1/16W
R220	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R221	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R222,223	ERJ3GEY0R00	Metal	0 ohm 1/16W
R224,225	YWR0816P621D	Metal	620 ohms 1/16W
R226	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R227	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R228	ERJ3GEYJ432V	Metal	4.3K ohms 1/16W
R229	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R230	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R231	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R232	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R233	ERJ3GEYJ821V	Metal	820 ohms 1/16W
R234	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R235,236	ERJ3GEY0R00	Metal	0 ohm 1/16W
R242	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R243	ERJ3GEYJ820V	Metal	82 ohms 1/16W
R244	ERJ3GEYJ151V	Metal	150 ohms 1/16W
R245	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R246	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R247	ERJ3GEYJ271V	Metal	270 ohms 1/16W
R248,249	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R250	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R251	ERJ3GEYJ563V	Metal	56K ohms 1/16W
R252	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R253	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R254	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R255	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R256,257	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R258	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R259	ERJ3GEYJ182V	Metal	1.8K ohms 1/16W
R260	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R261	ERJ3GEYJ132V	Metal	1.3K ohms 1/16W
R262	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R263	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R264	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R265,266	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R267	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R268	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R269	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R270	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R271	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R272	ERJ3GEYJ363V	Metal	36K ohms 1/16W
R273	ERJ3GEYJ182V	Metal	1.8K ohms 1/16W
R275	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R276	ERJ3GEYJ684V	Metal	680K ohms 1/16W
R277	ERJ3GEYJ361V	Metal	360 ohms 1/16W
R278	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R280	ERJ3GEYJ394	Metal	390K ohms 1/16W
R281	ERJ3GEY0R00	Metal	0 ohm 1/16W
R288	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W

EF. NO.	PART NO.	DESCRIPTION		REF. NO.	PART NO.	DESCRIPTION	
289	ERJ3GEYJ363V	Metal	36K ohms 1/16W	R392	ERJ3GEYJ471V	Metal	470 ohms 1/16W
290	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W	R400,401	ERJ3GEYJ331V	Metal	330 ohms 1/16W
291	ERJ3GEYJ103V	Metal	10K ohms 1/16W	R402-409	ERJ3GEYJ511V	Metal	510 ohms 1/16W
292	ERJ3GEYJ511V	Metal	510 ohms 1/16W	R411	ERJ3GEYJ102V	Metal	1K ohms 1/16W
293	ERJ3GEYJ200V	Metal	20 ohms 1/16W	R413	ERJ3GEYJ104V	Metal	100K ohms 1/16W
294	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W	R414	ERJ3GEYJ105V	Metal	1M ohms 1/16W
295	ERJ3GEYJ102V	Metal	1K ohms 1/16W	R415	ERJ3GEY0R00	Metal	0 ohm 1/16W
296	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W	R417	ERJ3GEYJ102V	Metal	1K ohms 1/16W
297	ERJ3GEYJ391V	Metal	390 ohms 1/16W	R418-421	ERJ3GEY0R00	Metal	0 ohm 1/16W
298	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W	R422	ERJ3GEYJ104V	Metal	100K ohms 1/16W
299	ERJ3GEYJ474V	Metal	470K ohms 1/16W	R430	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
309	ERJ3GEY0R00	Metal	0 ohm 1/16W	R431	ERJ3GEYJ102V	Metal	1K ohms 1/16W
310	ERJ3GEYJ105V	Metal	1M ohms 1/16W	R433	ERJ3GEYJ101V	Metal	100 ohms 1/16W
311,312	ERJ3GEYJ104V	Metal	100K ohms 1/16W	R434	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
313,314	ERJ3GEYJ331V	Metal	330 ohms 1/16W	R435,436	ERJ3GEYJ103V	Metal	10K ohms 1/16W
315-322	ERJ3GEYJ471V	Metal	470 ohms 1/16W	R437	ERJ3GEY0R00	Metal	0 ohm 1/16W
323,324	ERJ3GEYJ331V	Metal	330 ohms 1/16W	R438	ERJ3GEYJ105V	Metal	1M ohms 1/16W
325-328	ERJ3GEY0R00	Metal	0 ohm 1/16W	R439	ERJ3GEY0R00	Metal	0 ohm 1/16W
329,330	ERJ3GEYJ102V	Metal	1K ohms 1/16W	R440	ERJ3GEYJ223V	Metal	22K ohms 1/16W
341	ERJ3GEY0R00	Metal	0 ohm 1/16W	R441	ERJ3GEYJ201V	Metal	200 ohms 1/16W
342,343	ERJ3GEYJ102V	Metal	1K ohms 1/16W	R442	ERJ3GEYJ103V	Metal	10K ohms 1/16W
344	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W	R443,444	ERJ3GEYJ151V	Metal	150 ohms 1/16W
346	ERJ3GEYJ153V	Metal	15K ohms 1/16W	R445	ERJ3GEYJ223V	Metal	22K ohms 1/16W
347	ERJ3GEYJ102V	Metal	1K ohms 1/16W	R446	ERJ3GEY0R00	Metal	0 ohm 1/16W
348	ERJ3GEY0R00	Metal	0 ohm 1/16W	R447	ERJ3GEYJ223V	Metal	22K ohms 1/16W
349	ERJ3GEYJ101V	Metal	100 ohms 1/16W	R448,449	ERJ3GEY0R00	Metal	0 ohm 1/16W
350	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W	R450,451	ERJ3GEYJ223V	Metal	22K ohms 1/16W
351,352	ERJ3GEYJ103V	Metal	10K ohms 1/16W	R453	ERJ3GEYJ104V	Metal	100K ohms 1/16W
353	ERJ3GEYJ105V	Metal	1M ohms 1/16W	R455	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
354	ERJ3GEY0R00	Metal	0 ohm 1/16W	R456	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R359	ERJ3GEYJ201V	Metal	200 ohms 1/16W	R457	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R360	ERJ3GEYJ103V	Metal	10K ohms 1/16W	R460	ERJ3GEY0R00	Metal	0 ohm 1/16W
R361	ERJ3GEY0R00	Metal	0 ohm 1/16W	R461	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R362	ERJ3GEYJ223V	Metal	22K ohms 1/16W	R462	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R363,364	ERJ3GEYJ151V	Metal	150 ohms 1/16W	R463	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R365-369	ERJ3GEYJ223V	Metal	22K ohms 1/16W	R465	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R370	ERJ3GEY0R00	Metal	0 ohm 1/16W	R466	ERJ3GEYJ112V	Metal	1.1K ohms 1/16W
R371	ERJ3GEYJ101V	Metal	100 ohms 1/16W	R467	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R372	ERJ3GEYJ202V	Metal	2K ohms 1/16W	R468	ERJ3GEYJ471V	Metal	470 ohms 1/16W
R373	ERJ3GEYJ151V	Metal	150 ohms 1/16W	R501-509	YWR0816P242D	Metal	2.4K ohms 1/16W
R374	ERJ3GEYJ105V	Metal	1M ohms 1/16W	R510-516	YWR0816P122D	Metal	1.2K ohms 1/16W
R375	ERJ3GEY0R00	Metal	0 ohm 1/16W	R517-525	YWR0816P242D	Metal	2.4K ohms 1/16W
R376	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W	R526-532	YWR0816P122D	Metal	1.2K ohms 1/16W
R377	ERJ3GEYJ223V	Metal	22K ohms 1/16W	R533	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R378	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W	R534	ERJ3GEYJ621V	Metal	620 ohms 1/16W
R379,380	ERJ3GEYJ103V	Metal	10K ohms 1/16W	R535	ERJ3GEYJ362V	Metal	3.6K ohms 1/16W
R381	ERJ3GEYJ105V	Metal	1M ohms 1/16W	R536	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R384	ERJ3GEYJ123V	Metal	12K ohms 1/16W	R537	ERJ3GEYJ751V	Metal	750 ohms 1/16W
R385	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W	R538	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R386	ERJ3GEYJ302V	Metal	3K ohms 1/16W	R539	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R387	ERJ3GEYJ101V	Metal	100 ohms 1/16W	R540	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R388	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W	R541	ERJ3GEYJ471V	Metal	470 ohms 1/16W
R389	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W	R542	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R390	ERJ3GEYJ112V	Metal	1.1K ohms 1/16W	R543	ERJ3GEYJ122V	Metal	1.2K ohms 1/16W
R391	ERJ3GEYJ104V	Metal	100K ohms 1/16W	R544,545	ERJ3GEYJ560V	Metal	56 ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R546	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R547	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R548	ERJ3GEYJ473V	Metal	47K ohms 1/16W
R549	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R550	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R551	ERJ3GEYJ682V	Metal	6.8K ohms 1/16W
R552	ERJ3GEYJ271V	Metal	270 ohms 1/16W
R553	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R554	ERJ3GEYJ202V	Metal	2K ohms 1/16W
R555	ERJ3GEYJ242V	Metal	2.4K ohms 1/16W
R556	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R557	ERJ3GEYJ202V	Metal	2K ohms 1/16W
R558	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R559,560	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R561	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R562	ERJ3GEYJ242V	Metal	2.4K ohms 1/16W
R601-609	YWR0816P242D	Metal	2.4K ohms 1/16W
R610-616	YWR0816P122D	Metal	1.2K ohms 1/16W
R617	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R618	ERJ3GEYJ621V	Metal	620 ohms 1/16W
R619	ERJ3GEYJ751V	Metal	750 ohms 1/16W
R620	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R621	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R622	ERJ3GEYJ471V	Metal	470 ohms 1/16W
R623	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R624	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R625	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R626	ERJ3GEYJ122V	Metal	1.2K ohms 1/16W
R627	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R628	ERJ3GEY0R00	Metal	0 ohm 1/16W
R629	ERJ3GEYJ362V	Metal	3.6K ohms 1/16W
R630	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R632-640	YWR0816P242D	Metal	2.4K ohms 1/16W
R641-647	YWR0816P122D	Metal	1.2K ohms 1/16W
R648	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R702,705	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R707	ERJ3GEY0R00	Metal	0 ohm 1/16W
R710	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R712	ERJ3GEY0R00	Metal	0 ohm 1/16W
R713	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R714	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R727	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R728	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R729	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R730	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R731	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R732	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R733	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R734	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R735	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R736	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R737	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R738	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R739	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R740	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R741	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R742	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R743	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R744	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R745	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R746	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R747	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R748	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R749	ERJ3GEYJ183V	Metal	18K ohms 1/16W
R750	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R751	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R752	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R753	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R754,757	ERJ6GEYJ223V	Metal	22K ohms 1/10W
R760,763	ERJ6GEYJ223V	Metal	22K ohms 1/10W
R766,769	ERJ6GEYJ223V	Metal	22K ohms 1/10W
R772	ERJ6GEYJ223V	Metal	22K ohms 1/10W
R775	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R776	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R777	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R778-786	YWR1220Q750D	Metal	75 ohms 1/10W
R794	YWR1220Q750D	Metal	75 ohms 1/10W
R796	ERJ3GEY0R00	Metal	0 ohm 1/16W
R797	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R798	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R799	ERJ3GEYJ154V	Metal	150K ohms 1/16W
R800	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R801,802	ERJ3GEY0R00	Metal	0 ohm 1/16W
R803,804	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R805	ERJ3GEYJ473V	Metal	47K ohms 1/16W
R806	ERJ3GEYJ273V	Metal	27K ohms 1/16W
R807-816	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R817	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R818	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R821	ERJ3GEY0R00	Metal	0 ohm 1/16W
R835	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R837	ERJ3GEY0R00	Metal	0 ohm 1/16W
R838,839	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R841,844	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R846,847	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R849	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R850	ERJ3GEY0R00	Metal	0 ohm 1/16W
R851	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R852	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R853,855	ERJ3GEY0R00	Metal	0 ohm 1/16W
R856	ERJ3GEY0R00	Metal	0 ohm 1/16W
R857,858	ERJ3GEYJ431	Metal	430 ohms 1/16W
R859	ERJ3GEY0R00	Metal	0 ohm 1/16W
R862	YWR0816P682D	Metal	6.8K ohms 1/16W
R863	YWR0816P302D	Metal	3K ohms 1/16W
R864	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R865	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R866-886	ERJ3GEYJ121V	Metal	120 ohms 1/16W
R887	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R888	ERJ3GEYJ223V	Metal	22K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R889	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R890	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R891	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R892	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R893	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R894	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R895	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R896	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R897	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R898	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R899	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R900	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R904	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R905	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R906	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R907	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R908	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R909	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R924	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R925	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R926	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R927	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R928	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R929	ERJ3GEYJ564V	Metal	560K ohms 1/16W
R930	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R931	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R932	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R933	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R934	ERJ3GEYJ393V	Metal	39K ohms 1/16W
R935	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R936	ERJ3GEYJ562V	Metal	5.6K ohms 1/16W
R937	ERJ3GEYJ563V	Metal	56K ohms 1/16W
R938,939	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R940	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R941	ERJ3GEYJ393V	Metal	39K ohms 1/16W
R942	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R951	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R952	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R953	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R954	YWR0816P222D	Metal	2.2K ohms 1/16W
R955	YWR0816P102D	Metal	1K ohms 1/16W
R956	ERJ3GEYJ123V	Metal	12K ohms 1/16W
R957	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R958	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R959	ERJ3GEYJ392V	Metal	3.9K ohms 1/16W
R960	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R961	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R962	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R963	ERJ3GEYJ752V	Metal	7.5K ohms 1/16W
R964,965	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R966	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R967	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R968	ERJ3GEYJ154V	Metal	150K ohms 1/16W
R969	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R970	ERJ3GEYJ153V	Metal	15K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R971	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R972	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R973	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R974	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R975	ERJ3GEYJ561V	Metal	560 ohms 1/16W
R976	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R977	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R978	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R979	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R980	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R981	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R982	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R983	ERJ3GEYJ224V	Metal	220K ohms 1/16W
R984	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R1102	ERJ3GEYJ363V	Metal	36K ohms 1/16W
R1103	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1104	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R1105	ERJ3GEYJ512V	Metal	5.1K ohms 1/16W
R1106	ERJ3GEYJ300	Metal	30 ohms 1/16W
R1107	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1108	ERJ3GEYJ684V	Metal	680K ohms 1/16W
R1109	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R1110	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R1111,1112	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1113	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R1114	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1115	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R1116	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R1117	ERJ3GEYJ473V	Metal	47K ohms 1/16W
R1118	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1119	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R1201,1202	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1203	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R1204	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R1205	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R1207	ERJ3GEYJ273V	Metal	27K ohms 1/16W
R1208	ERJ3GEYJ362V	Metal	3.6K ohms 1/16W
R1209	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R1210	YWR0816R134D	Metal	130K ohms 1/16W
R1211	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R1212	YWR0816P183D	Metal	18K ohms 1/16W
R1213	ERJ3GEYJ363V	Metal	36K ohms 1/16W
R1214	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R1215	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R1216	ERJ3GEYJ154V	Metal	150K ohms 1/16W
R1217	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1218	YWR0816R184D	Metal	180K ohms 1/16W
R1219-1221	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R1222,1224	ERJ3GEY0R00	Metal	0 ohm 1/16W
R1226-1228	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R1229,1230	ERJ3GEY0R00	Metal	0 ohm 1/16W
R1500(L102)	ERJ14Y0R00H	Metal	0 ohm
VR101	EVM1DSW30B13	Variable Resistor	1K ohms
VR102	EVM1DSW30BE2	Variable Resistor	220 ohms
VR103,200	EVM1DSW30B13	Variable Resistor	1K ohms

REF. NO.	PART NO.	DESCRIPTION	
VR201	EVM1DSW30B14	Variable Resistor	10K ohms
VR202	EVM1DSW30B13	Variable Resistor	1K ohms
VR501	EVM1DSW30B53	Variable Resistor	5K ohms
VR502	EVM1DSW30B13	Variable Resistor	1K ohms
VR601	EVM1DSW30B53	Variable Resistor	5K ohms
VR602	EVM1DSW30B13	Variable Resistor	1K ohms
Z101-104	EXBV8V680JV	Block Resistor	68 ohms
C101	F2G0J6810002	Electrolytic	680 µF 6.3V
C102	EEVHB0J101P	Electrolytic	100 µF 6.3V
C104	F1H1H330A231	Ceramic	33 pF
C105	F1H1H300A004	Ceramic	30 pF
C107	F1H1H390A004	Ceramic	39 pF
C108	F1H1A105A004	Ceramic	1 µF
C109	F1H0J105A001	Ceramic	1 µF
C110	F1H1H102A004	Ceramic	1000 pF
C111	MCUV1E104ZFV	Ceramic	0.1 µF
C114	F1H1H103A190	Ceramic	0.01 µF
C116	MCUV1E104ZFV	Ceramic	0.1 µF
C117	F1H1H103A190	Ceramic	0.01 µF
C118-125	MCUV1E104ZFV	Ceramic	0.1 µF
C126	EEVHB0J101P	Electrolytic	100 µF 6.3V
C127	F1H1H240A004	Ceramic	24 pF
C128	F1H1H3610001	Ceramic	360 pF
C129	F1H1H103A190	Ceramic	0.01 µF
C130	F1H1H102A004	Ceramic	1000 pF
C131	MCUV1E104ZFV	Ceramic	0.1 µF
C133	F1H1H103A190	Ceramic	0.01 µF
C135	F1H1A474A025	Ceramic	0.47 µF
C136,137	MCUV1E104ZFV	Ceramic	0.1 µF
C138	F1H1H102A004	Ceramic	1000 pF
C139	F1H1H103A190	Ceramic	0.01 µF
C140	F1H1H221A004	Ceramic	220 pF
C141-143	MCUV1E104ZFV	Ceramic	0.1 µF
C170	F1H1H220A004	Ceramic	22 pF
C173	F1H1A105A004	Ceramic	1 µF
C174	F1H1H240A004	Ceramic	24 pF
C175	F1H0J105A001	Ceramic	1 µF
C176	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C178	MCUV1E104ZFV	Ceramic	0.1 µF
C179	F1H1H102A004	Ceramic	1000 pF
C180	F1H1H101A004	Ceramic	100 pF
C181	F1H1A105A004	Ceramic	1 µF
C182	F1H1H331A650	Ceramic	330 pF
C183	F1H1H102A004	Ceramic	1000 pF
C200	F1H1H160A004	Ceramic	16 pF
C201	F1H1H101A004	Ceramic	100 pF
C202	MCUV1H470JCV	Ceramic	47 pF
C204	EEVHB0J101P	Electrolytic	100 µF 6.3V
C205	MCUV1E104ZFV	Ceramic	0.1 µF
C206	F1H1A105A004	Ceramic	1 µF
C208	EEVHB0J101P	Electrolytic	100 µF 6.3V
C210-213	MCUV1E104ZFV	Ceramic	0.1 µF
C215	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C216	F1H1H240A004	Ceramic	24 pF
C217	F1H1H3610001	Ceramic	360 pF
C218	MCUV1E104ZFV	Ceramic	0.1 µF
C219	F1H1E333A002	Ceramic	0.033 µF
C220	F1H1H101A004	Ceramic	100 pF
C222-225	MCUV1E104ZFV	Ceramic	0.1 µF
C226	EEVHB0J101P	Electrolytic	100 µF 6.3V
C227	F1H1H102A004	Ceramic	1000 pF
C228	F1H1H103A190	Ceramic	0.01 µF
C229	F1H1H102A004	Ceramic	1000 pF
C230	F1H1A105A004	Ceramic	1 µF
C231-234	MCUV1E104ZFV	Ceramic	0.1 µF
C235	F1H1C5630001	Ceramic	0.056 µF
C236	F1H1H560A004	Ceramic	56 pF
C237	F1H1A474A025	Ceramic	0.47 µF
C238	MCUV1E104ZFV	Ceramic	0.1 µF
C239	F1H1H221A004	Ceramic	220 pF
C241	F1H1H331A650	Ceramic	330 pF
C242	F1H1H221A004	Ceramic	220 pF
C243,244	MCUV1E104ZFV	Ceramic	0.1 µF
C245	F1H1A105A004	Ceramic	1 µF
C246	F1H1H102A004	Ceramic	1000 pF
C247,251	MCUV1E104ZFV	Ceramic	0.1 µF
C253	F2G0J6810002	Electrolytic	680 µF 6.3V
C254	EEVHB0J101P	Electrolytic	100 µF 6.3V
C255	MCUV1E104ZFV	Ceramic	0.1 µF
C256	F1H1H102A004	Ceramic	1000 pF
C257	F1H1H101A004	Ceramic	100 pF
C258	F1H1H332A013	Ceramic	3300 pF
C259	F1H1H152A013	Ceramic	1500 pF
C260,261	F1H1A105A004	Ceramic	1 µF
C262	MCUV1H470JCV	Ceramic	47 pF
C263	MCUV1E104ZFV	Ceramic	0.1 µF
C264	F1H1H102A004	Ceramic	1000 pF
C265	F1H1H3010001	Ceramic	300 pF
C266	F1H1H221A004	Ceramic	220 pF
C267	F1H1H391A004	Ceramic	390 pF
C269	MCUV1E104ZFV	Ceramic	0.1 µF
C270	F1H1H102A004	Ceramic	1000 pF
C271	F1H1H391A004	Ceramic	390 pF
C272	MCUV1E104ZFV	Ceramic	0.1 µF
C275	F1H1A105A004	Ceramic	1 µF
C276	F1H1H101A004	Ceramic	100 pF
C277	MCUV1E104ZFV	Ceramic	0.1 µF
C278	F1H1H123A190	Ceramic	0.012 µF
C279-281	MCUV1E104ZFV	Ceramic	0.1 µF
C282	F1H1H101A004	Ceramic	100 pF
C283,284	MCUV1E104ZFV	Ceramic	0.1 µF
C285	F1H1H101A004	Ceramic	100 pF
C286	MCUV1E104ZFV	Ceramic	0.1 µF
C307	F1H1H471A650	Ceramic	470 pF
C308	MCUV1H820JCV	Ceramic	82 pF
C310	F1H1H471A650	Ceramic	470 pF
C312	EEVHB0J101P	Electrolytic	100 µF 6.3V
C313-315	MCUV1E104ZFV	Ceramic	0.1 µF
C316	EEVHB0J101P	Electrolytic	100 µF 6.3V
C317-324	MCUV1E104ZFV	Ceramic	0.1 µF

REF. NO.	PART NO.	DESCRIPTION	
C340	EEVHB0J221P	Electrolytic	220 µF 6.3V
C341-347	MCUV1E104ZFV	Ceramic	0.1 µF
C352	F1H1C104A001	Ceramic	0.1 µF
C353	F1H1H222A013	Ceramic	2200 pF
C354	F1H1H331A650	Ceramic	330 pF
C355,356	F1H1H240A004	Ceramic	24 pF
C357	MCUV1H820JCV	Ceramic	82 pF
C358	F1H1H331A650	Ceramic	330 pF
C363	F1H1H103A190	Ceramic	0.01 µF
C364	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C365,366	MCUV1E104ZFV	Ceramic	0.1 µF
C367	F1H1H120A004	Ceramic	12 pF
C368,370	F1H1H221A004	Ceramic	220 pF
C371	F1H1A105A004	Ceramic	1 µF
C372	F1H1H331A650	Ceramic	330 pF
C373	F1H1H5R00001	Ceramic	5 pF
C374	F1H1H331A650	Ceramic	330 pF
C375	F1H1H680A004	Ceramic	68 pF
C378	F1H1H331A650	Ceramic	330 pF
C379-389	MCUV1E104ZFV	Ceramic	0.1 µF
C390	EEVHB0J101P	Electrolytic	100 µF 6.3V
C392	F1H1H102A004	Ceramic	1000 pF
C400	EEVHB0J101P	Electrolytic	100 µF 6.3V
C401-403	MCUV1E104ZFV	Ceramic	0.1 µF
C404	EEVHB0J101P	Electrolytic	100 µF 6.3V
C405	MCUV1E104ZFV	Ceramic	0.1 µF
C408,410	F1H1H471A650	Ceramic	470 pF
C413-419	MCUV1E104ZFV	Ceramic	0.1 µF
C430	F1H1C104A001	Ceramic	0.1 µF
C431	F1H1H222A013	Ceramic	2200 pF
C432	F1H1H331A650	Ceramic	330 pF
C433,434	F1H1H100A017	Ceramic	10 pF
C435,436	F1H1H331A650	Ceramic	330 pF
C437	F1H1H103A190	Ceramic	0.01 µF
C438	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C439-451	MCUV1E104ZFV	Ceramic	0.1 µF
C452	EEVHB0J101P	Electrolytic	100 µF 6.3V
C453-455	MCUV1E104ZFV	Ceramic	0.1 µF
C456	F1H1E154A004	Ceramic	0.15 µF
C457,458	MCUV1E104ZFV	Ceramic	0.1 µF
C459	F1H1E333A002	Ceramic	0.033 µF
C460	F1H1H222A013	Ceramic	2200 pF
C461,462	MCUV1E104ZFV	Ceramic	0.1 µF
C463	F1H1H102A004	Ceramic	1000 pF
C465	F1H1H222A013	Ceramic	2200 pF
C503	F1H1H240A004	Ceramic	24 pF
C504	F1H1H101A004	Ceramic	100 pF
C505	F1H1H3610001	Ceramic	360 pF
C506	MCUV1E104ZFV	Ceramic	0.1 µF
C507,508	EEVHB0J101P	Electrolytic	100 µF 6.3V
C512	MCUV1E104ZFV	Ceramic	0.1 µF
C513	EEVHB0J101P	Electrolytic	100 µF 6.3V
C514	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C515	F1H1A105A004	Ceramic	1 µF
C516,517	MCUV1E104ZFV	Ceramic	0.1 µF

REF. NO.	PART NO.	DESCRIPTION	
C518	EEVHB0J101P	Electrolytic	100 µF 6.3V
C519-521	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C602	F1H1H240A004	Ceramic	24 pF
C603	F1H1H101A004	Ceramic	100 pF
C604	F1H1H3610001	Ceramic	360 pF
C605	MCUV1E104ZFV	Ceramic	0.1 µF
C606,607	EEVHB0J101P	Electrolytic	100 µF 6.3V
C611,612	EEVHB0J101P	Electrolytic	100 µF 6.3V
C635	F1H1H331A650	Ceramic	330 pF
C636	F1H1A105A004	Ceramic	1 µF
C700-702	MCUV1E104ZFV	Ceramic	0.1 µF
C703	EEVHB0J101P	Electrolytic	100 µF 6.3V
C704	MCUV1E104ZFV	Ceramic	0.1 µF
C707	EEVHB0J101P	Electrolytic	100 µF 6.3V
C708	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C709,710	MCUV1E104ZFV	Ceramic	0.1 µF
C713	EEVHB0J101P	Electrolytic	100 µF 6.3V
C714	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C715,716	MCUV1E104ZFV	Ceramic	0.1 µF
C719	EEVHB0J221P	Electrolytic	220 µF 6.3V
C720,721	MCUV1E104ZFV	Ceramic	0.1 µF
C729	MCUV1E104ZFV	Ceramic	0.1 µF
C730	EEVHB0J101P	Electrolytic	100 µF 6.3V
C731	MCUV1E104ZFV	Ceramic	0.1 µF
C732	EEVHB0J101P	Electrolytic	100 µF 6.3V
C733	MCUV1E104ZFV	Ceramic	0.1 µF
C734	EEVHB0J101P	Electrolytic	100 µF 6.3V
C735	MCUV1E104ZFV	Ceramic	0.1 µF
C736	EEVHB0J101P	Electrolytic	100 µF 6.3V
C737	MCUV1E104ZFV	Ceramic	0.1 µF
C738	EEVHB0J101P	Electrolytic	100 µF 6.3V
C739	MCUV1E104ZFV	Ceramic	0.1 µF
C740	EEVHB0J101P	Electrolytic	100 µF 6.3V
C741	MCUV1E104ZFV	Ceramic	0.1 µF
C742	EEVHB0J101P	Electrolytic	100 µF 6.3V
C743	MCUV1E104ZFV	Ceramic	0.1 µF
C744	EEVHB0J101P	Electrolytic	100 µF 6.3V
C745	MCUV1E104ZFV	Ceramic	0.1 µF
C746	EEVHB0J101P	Electrolytic	100 µF 6.3V
C761	EEVHB0J221P	Electrolytic	220 µF 6.3V
C762	MCUV1E104ZFV	Ceramic	0.1 µF
C763,764	EEVHB0J101P	Electrolytic	100 µF 6.3V
C765	MCUV1E104ZFV	Ceramic	0.1 µF
C770,780	MCUV1E104ZFV	Ceramic	0.1 µF
C781,782	MCUV1E104ZFV	Ceramic	0.1 µF
C783	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C784	EEVHB0J101P	Electrolytic	100 µF 6.3V
C791,800	F1H1H101A004	Ceramic	100 pF
C801	MCUV1E104ZFV	Ceramic	0.1 µF
C802,803	F1H1H101A004	Ceramic	100 pF
C804,805	MCUV1E104ZFV	Ceramic	0.1 µF
C806	F1H1E473A002	Ceramic	0.047 µF
C807	MCUV1E104ZFV	Ceramic	0.1 µF
C842	F1H0J105A001	Ceramic	1 µF
C843	MCUV1E104ZFV	Ceramic	0.1 µF

REF. NO.	PART NO.	DESCRIPTION	
C844	F1H0J105A001	Ceramic	1 µF
C845,846	MCUV1E104ZFV	Ceramic	0.1 µF
C848,849	F1H1H300A004	Ceramic	30 pF
C857	F1H1A105A004	Ceramic	1 µF
C858-860	MCUV1E104ZFV	Ceramic	0.1 µF
C861	EEVHB0J101P	Electrolytic	100 µF 6.3V
C862,864	MCUV1E104ZFV	Ceramic	0.1 µF
C865	MCUV1E104ZFV	Ceramic	0.1 µF
C866,867	F1H1H101A004	Ceramic	100 pF
C869	EEVHB0J101P	Electrolytic	100 µF 6.3V
C870	MCUV1E104ZFV	Ceramic	0.1 µF
C871	F1H1E223A011	Ceramic	0.022 µF
C872,873	MCUV1E104ZFV	Ceramic	0.1 µF
C874	EEVHB0J101P	Electrolytic	100 µF 6.3V
C875,877	MCUV1E104ZFV	Ceramic	0.1 µF
C878-887	F1H1H103A190	Ceramic	0.01 µF
C895,896	F1H1H103A190	Ceramic	0.01 µF
C897	F1H1A105A004	Ceramic	1 µF
C898	MCUV1E104ZFV	Ceramic	0.1 µF
C899	F1H1A105A004	Ceramic	1 µF
C950	EEVHB0J221P	Electrolytic	220 µF 6.3V
C951	F1H1H130A004	Ceramic	13 pF
C952	EEVHB0J101P	Electrolytic	100 µF 6.3V
C953	F1H0J105A001	Ceramic	1 µF
C954	MCUV1E104ZFV	Ceramic	0.1 µF
C955	F1H1H101A004	Ceramic	100 pF
C956	F1H1A105A004	Ceramic	1 µF
C957	F1H1H331A650	Ceramic	330 pF
C958	F1H1H102A004	Ceramic	1000 pF
C959	MCUV1E104ZFV	Ceramic	0.1 µF
C960	F1H1A105A004	Ceramic	1 µF
C961	F1H1H300A004	Ceramic	30 pF
C962	F1H1H220A004	Ceramic	22 pF
C964	F1H1E223A011	Ceramic	0.022 µF
C965	F1H1H103A190	Ceramic	0.01 µF
C966	EEVHB0J101P	Electrolytic	100 µF 6.3V
C967	F1H1C5630001	Ceramic	0.056 µF
C968,969	MCUV1E104ZFV	Ceramic	0.1 µF
CT301	ECRJA030E11W	Trimmer	
CT400	ECRJA050M11W	Trimmer	
L101	G1C8R2J00002	Coil	8.2 µH
L103	G1C330J00002	Coil	33 µH
L104	G1C100J00001	Coil	10 µH
L105	G1C8R2J00002	Coil	8.2 µH
L106	G1C560J00002	Coil	56 µH
L107	G1C3R9J00002	Coil	3.9 µH
L108	G1C560J00002	Coil	56 µH
L109	G1C8R2J00002	Coil	8.2 µH
L200	G1C560J00002	Coil	56 µH
L201	G1C820J00002	Coil	82 µH
L202	G1C8R2J00002	Coil	8.2 µH
L203	G1C560J00002	Coil	56 µH
L204	G1C3R9J00002	Coil	3.9 µH
L205,206	G1C8R2J00002	Coil	8.2 µH
L300,301	G1C8R2J00002	Coil	8.2 µH

REF. NO.	PART NO.	DESCRIPTION	
L302	G1C5R6J00001	Coil	5.6 µH
L303	EIC4EJ011E	Coil	
L304,400	G1C8R2J00002	Coil	8.2 µH
L401	EIC4EJ011E	Coil	
L402	G1C5R6J00001	Coil	5.6 µH
L403	G1C8R2J00002	Coil	8.2 µH
L501	G1C560J00002	Coil	56 µH
L502	G1C3R9J00002	Coil	3.9 µH
L503-505	G1C8R2J00002	Coil	8.2 µH
L601	G1C560J00002	Coil	56 µH
L602	G1C3R9J00002	Coil	3.9 µH
L603,604	G1C8R2J00002	Coil	8.2 µH
L700-707	G1C8R2J00002	Coil	8.2 µH
L708,709	G1C5R6J00001	Coil	5.6 µH
L801,802	G1C8R2J00002	Coil	8.2 µH
L950,951	G1C8R2J00002	Coil	8.2 µH
L952	G1C330J00002	Coil	33 µH
SW800	ESD11V120	Slide Switch	
X200	YFCSB503F2	Crystal Oscillator	
X300	H0J177500007	Crystal Oscillator	
X301	H0J270500003	Crystal Oscillator	
X302,400	H0J177500007	Crystal Oscillator	
X800	YWCSA7.37MTZ	Oscillator	
CN300	YW530140810	8-pin Connector	
CN301	YW530141210	12-pin Connector	
CN302	YW530140610	6-pin Connector	
CN303	K1KA14A00025	14-pin Connector	
CN304	YW530141310	13-pin Connector	
CN700	K1KA05A00082	5-pin Connector	
CN701-709 ⚠	K1QBB2CB0003	BNC Connector	
CN717	YWB8BPHKS	8-pin Connector	
BZ800	PKM22EPP4002	Buzzer	
E800-805	YWMEP1866	Terminal	
TP100,201	YWRCT2125TPV	Test-pin	
TP202,303	YWRCT2125TPV	Test-pin	
TP305,306	YWRCT2125TPV	Test-pin	
TP400,405	YWRCT2125TPV	Test-pin	
TP406,407	YWRCT2125TPV	Test-pin	
TP501,502	YWRCT2125TPV	Test-pin	
TP802-805	YW32BM7R5	Test-pin	

ACCESSORY PARTS / PACKAGING PARTS

M50	YWA2SA1756A3	Rack Mounting Bracket
M51	XSB3+10FN	Screws M3x10
M52 ⚠	YWV5EA0505B3	Switch Protector
M53 ⚠	V8QA5640AN	Operating Instructions
M54	PE26X40C05B	Polyethylene Bag
M55	YWT050803	Polyethylene Bag
M56	V8RA1261AN	Printed Matters
M57	PE55X71C1B	Polyethylene Bag
M58	PE20X25C05B	Polyethylene Bag
M60	V9CA4338AN	Packaging Ass'y

VIDEO MULTIPLEXER WJ-FS416

MISCELLANEOUS

REF. NO.		PART NO.	DESCRIPTION
CN101		YWVAR2	Connector Cover
F1	⚠	XBA2C20ET0A	Current Fuse
E7		YW840522	Fuse Cover
E101	⚠	K2CC3ER00001	Power Cord for WJ-FS416/B
	⚠	YWACF250G	Power Cord for WJ-FS416/G
M1		YWA5RG0141A3	Power Switch Knob
M2	⚠	YWV5CA0504B2	Switch Guard
M3		V5WK2535A2	Front Panel
M4		YWV1AA1074A4	Standard Screw
M5		YWV1VA0546A3	LED Lens
M6		YWV2KA1267A1	Front Chassis
M7		YWV6JA1156A3	Button
M8		YWV6JA1157A3	Button
M9		YWV6JB1156A3	Button
M10		YWV5EA2355A1	Upper Cover
M11		YWV2KB1233A1	Main Chassis
M12		YWV5LA0067A4	Rubber Foot
M13		YWA2LA0070A4	Joint
M14		YWCKT10V0	Cord Clamp
M15	⚠	YWA7SA0689A4	Earth Mark Label
M16	⚠	V7QA5717A4	Main Label for WJ-FS416/B
	⚠	V7QA5718A4	Main Label for WJ-FS416/G
M17		YWA1AA0272A4	Binding Head Screw
M18		YFV7MB0099A4	Caution Label
M19		YW0920	Tack
M20	⚠	YWV2PA1211A4	Insulator Sheet
M21		YWV2SA4742A3	Mounting Angle for D SUB Board
M22		V5WH2536A2	Rear Panel
M23		JFS2.6SB1WM	Special Screw
M24	⚠	YWSR6W1	Cord Clamp for WJ-FS416/B
	⚠	YWSR5N4	Cord Clamp for WJ-FS416/G
M26		YWA1AA0270A4	Binding Head Screw
M27		YWCS1	Cord Clamp
M28	⚠	YWV2PA1190A3	Insulator Sheet
M29		V7SA4171A4	PS Data Label

FRONT BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB1 (RTL)	JF316PKY1A	Printed Circuit Board Ass'y	
IC2,3	C0JBAF000252	IC	
IC5	C0JBAF000252	IC	
D1	LN342GP	LED	
D2	B3AAA0000380	LED	
D4-21	LN1361CTR	LED	
D23	LN1361CTR	LED	
R1	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R2	ERJ6GEY0R00	Metal	0 ohm 1/10W
R8,10	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R12,14	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R15,16	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R18,20	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R22,24	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R28,30	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R32,34	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R36,38	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R40,42	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R44	ERJ6GEYJ561V	Metal	560 ohms 1/10W
R48-59	ERJ6GEYJ223V	Metal	22K ohms 1/10W
R62-65	ERJ6GEYJ332V	Metal	3.3K ohms 1/10W
C1	EEVHB0J470R	Electrolytic	47 µF 6.3V
C3	YF400104FZT	Ceramic	0.1 µF
C4,6	YF400104FZT	Ceramic	0.1 µF
L1	G1C8R2J00002	Coil	8.2 µH
SW1-23	EVQ11A05R	Push Switch	
SW25	EVQ11A05R	Push Switch	
E1	ELY322V513	Wire Ass'y for Main Board CN304	
E2	K1PA14C00001	Wire Ass'y for Main Board CN303	
M25	YWLDS90K	LED Holder	

D-SUB BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB2 (RTL)	JF316PKB1A	Printed Circuit Board Ass'y	
D1-4	MAZ80560ML	Diode	
VS1-4	ERZV07D680	ZNR	
R1-10	ERJ6GEYJ101V	Metal	100 ohms 1/10W
R12,13	ERJ6GEYJ101V	Metal	100 ohms 1/10W
R14	ERJ6GEY0R00	Metal	0 ohm 1/10W
R15-23	ERJ6GEYJ101V	Metal	100 ohms 1/10W
R30	ERJ12YJ151H	Metal	150 ohms 1/2W
C1-10	YF400104FZT	Ceramic	0.1 µF
C12-23	YF400104FZT	Ceramic	0.1 µF
L1-10	G1C101J00002	Coil	100 µH
L12,13	G1C101J00002	Coil	100 µH
L14	G1C151J00001	Coil	150 µH
L15-23	G1C101J00002	Coil	100 µH
L24	G1C151J00001	Coil	150 µH
SW1	ESD11V120	Slide Switch	
CF1	YWNFA41R222T	Ceramic Filter	
CN1	YWJBY25S1A3G	25-pin D-sub Connector	
CN2	K2HA101B0004	Jack	
CN3	YWTM11R5C66	Modular Jack	
E1	ATY217V512	Wire Ass'y for Main Board CN301	
E2	K1PQ13D00001	Wire Ass'y for Main Board CN302	
E3	ATY314V508	Wire Ass'y for Main Board CN300	

REF. NO.	PART NO.	DESCRIPTION
	BNC BOARD	
PCB3 (RTL)	JF316PKC1A	Printed Circuit Board Ass'y
R1,2	D1BD68R00001	Metal 68 ohms
R3	YWR1220Q750D	Metal 75 ohms 1/10W
R4	YWR1220P122D	Metal 1.2K ohms
CN1 ⚠	K1QBB4AB0007	BNC Connector
E1	FS116C02A	Wire Ass'y for Main Board CN717
	POWER BOARD	
	Refer to Replacement Parts List for Power Board of WJ-FS409 on Page 27.	
	MAIN BOARD	
PCB5 (RTL)	JF416EKZ1A	Printed Circuit Board Ass'y
IC102	C1AB00000191	IC
IC103	YWTC4S66FL	IC
IC104	YW74HC04ADTE	IC
IC105	YWNJM4565M	IC
IC200,201	C0FBAD000003	IC
IC202	YWTC4W53FUL	IC
IC203	YW74HC04ADTE	IC
IC204	YWNJM2229M	IC
IC205	YW74HC04ADTE	IC
IC206	YWTC7S00FUL	IC
IC209	74HC4538ADTE	IC
IC210	YWTC7S08FUL	IC
IC211	C0JBAK000129	IC
IC212	C0JBAC000178	IC
IC213	C0JBAK000129	IC
IC214	YWTC7W08FUL	IC
IC300	YWMVT85038	IC
IC303	YW6016TC1443	IC
IC304	C3ZAF0000018	IC
IC310	C1AB00000368	IC
IC311-313	C3ABKG000023	IC
IC400	YWMVT85038	IC
IC401	C1AB00000368	IC
IC402-404	C3ABKG000023	IC
IC405,406	YWTC4W53FUL	IC
IC407	YWTC7S08FUL	IC
IC408-412	YWTC4W53FUL	IC
IC501	YWTC7S08FUL	IC
IC503,504	YWNJM2244M	IC

REF. NO.	PART NO.	DESCRIPTION
IC601	YWTC7S08FUL	IC
IC700	C0JBAS000124	IC
IC701-706	C0JBAS000134	IC
IC709	YW74HC04ADTE	IC
IC713,714	C0JBAS000134	IC
IC715	YWTC7S04FUL	IC
IC800,801	C1DA00000163	IC
IC802	74HC4538ADTE	IC
IC803	MC74AC32DTL	IC
IC804	YWBR93LC66RF	IC
IC805	C2BBGF000106	IC
IC806	C3BBDG000005	IC
IC808,810	C0JBAN000139	IC
IC811	C0JBAN000139	IC
IC812	C0JBAZ000995	IC
IC813	C0EBH0000063	IC
IC814	74HC374ADTE	IC
IC815	C0JBAZ000995	IC
IC816	YW74HC08DTE	IC
IC817-819	YWHD74HC257F	IC
IC950	C9ZB00000121	IC
IC952	C0BBBA000023	IC
Q102-104	YWXN0450100L	Transistor
Q105	IMZ1A	Transistor
Q106,107	2SD1819AHL	Transistor
Q108	2SA1226-E3	Transistor
Q109	B1ABBB000072	Transistor
Q110	2SB1218AHL	Transistor
Q111	IMZ1A	Transistor
Q113	IMZ1A	Transistor
Q114	2SD1819AHL	Transistor
Q118	XN0440100L	Transistor
Q119,121	YWXN0450100L	Transistor
Q122	2SB1218AHL	Transistor
Q123	YWXN0450100L	Transistor
Q124	XN0440100L	Transistor
Q200	2SB1218AHL	Transistor
Q201,202	YWXN0450100L	Transistor
Q203,204	IMZ1A	Transistor
Q205,206	2SD1819AHL	Transistor
Q209	B1ABBB000072	Transistor
Q210	IMZ1A	Transistor
Q211	XN0140100L	Transistor
Q212,213	2SD1819AHL	Transistor
Q214	XN0150100L	Transistor
Q215	2SD1819AHL	Transistor
Q216,217	YWXN0450100L	Transistor
Q219	YWXN0450100L	Transistor
Q220	XN0440100L	Transistor
Q221	2SD1819AHL	Transistor
Q302,304	B1CBBF000007	Transistor
Q305	IMZ1A	Transistor
Q306	B1CBBF000007	Transistor
Q401-405	B1CBBF000007	Transistor
Q501-506	2SD1819AHL	Transistor

REF. NO.	PART NO.	DESCRIPTION	
Q507,508	2SC2411K-T46	Transistor	
Q603	2SB1218AHL	Transistor	
Q604-608	2SD1819AHL	Transistor	
Q707-723	B1ABBB000072	Transistor	
Q729-731	2SB1218AHL	Transistor	
Q800,802	2SD1819AHL	Transistor	
Q803,804	YWXN0450100L	Transistor	
Q805	2SD1819AHL	Transistor	
Q806	2SB1218AHL	Transistor	
Q807	2SC2411K-T46	Transistor	
Q808	YWXN0450100L	Transistor	
Q950	2SB1218AHL	Transistor	
Q951,952	YWXN0450100L	Transistor	
Q953	IMZ1A	Transistor	
Q954	2SB1218AHL	Transistor	
Q955	YWXN0450100L	Transistor	
Q956	2SB1218AHL	Transistor	
D300,301	YWHVU359TRF	Diode	
D303,304	YWHVU359TRF	Diode	
D305,306	MA2Z372E0L	Diode	
D400,401	YWHVU359TRF	Diode	
D402,403	MA2Z372E0L	Diode	
D404	B0ACCJ000016	Diode	
D405	MA2Z372E0L	Diode	
D501-503	DA204K-T46	Diode	
D703-719	DA204K-T46	Diode	
D800	DA204K-T46	Diode	
D950	B0ACCJ000016	Diode	
D951,952	DA204K-T46	Diode	
R100,101	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R102	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R103	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R104	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R105,106	YWR0816P102D	Metal	1K ohms 1/16W
R107	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R108	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R109	ERJ3GEY0R00	Metal	0 ohm 1/16W
R110	ERJ3GEYJ202V	Metal	2K ohms 1/16W
R111	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R112	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R113	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R114	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R115,116	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R117	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R118	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R119	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R121	ERJ3GEYJ750V	Metal	75 ohms 1/16W
R124	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R125	ERJ3GEYJ391V	Metal	390 ohms 1/16W
R126	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R128	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R131	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R132,133	YWR0816P621D	Metal	620 ohms 1/16W
R134	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R135	ERJ3GEYJ333V	Metal	33K ohms 1/16W
R136	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R137	YWR0816P561D	Metal	560 ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R138	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R139	ERJ3GEYJ151V	Metal	150 ohms 1/16W
R140	YWR0816P222D	Metal	2.2K ohms 1/16W
R141	ERJ3GEY0R00	Metal	0 ohm 1/16W
R142	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R143	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R144	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R145	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R146	YWR0816P153D	Metal	15K ohms 1/16W
R147	YWR0816P162D	Metal	1.6K ohms 1/16W
R148	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R149	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R150	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R151	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R152	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R153-155	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R156	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R157,158	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R159	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R160	ERJ3GEYJ394	Metal	390K ohms 1/16W
R161	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R169	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R183,184	YWR0816P222D	Metal	2.2K ohms 1/16W
R185	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R186	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R189	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R190,200	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R201	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R202	YWR0816P102D	Metal	1K ohms 1/16W
R203	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R204	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R206	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R207	YWR0816P102D	Metal	1K ohms 1/16W
R208	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R209	ERJ3GEYJ391V	Metal	390 ohms 1/16W
R210	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R211	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R212	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R213	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R214	ERJ3GEY0R00	Metal	0 ohm 1/16W
R215	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R216	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R217	ERJ3GEY0R00	Metal	0 ohm 1/16W
R218	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R219	ERJ3GEYJ162V	Metal	1.6K ohms 1/16W
R220	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R221	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R222,223	ERJ3GEY0R00	Metal	0 ohm 1/16W
R224,225	YWR0816P621D	Metal	620 ohms 1/16W
R226,227	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R228	ERJ3GEYJ432V	Metal	4.3K ohms 1/16W
R229	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R230	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R231	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R232	ERJ3GEYJ103V	Metal	10K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R233	ERJ3GEYJ821V	Metal	820 ohms 1/16W
R234	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R235,236	ERJ3GEY0R00	Metal	0 ohm 1/16W
R242	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R243	ERJ3GEYJ820V	Metal	82 ohms 1/16W
R244	ERJ3GEYJ151V	Metal	150 ohms 1/16W
R245	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R246	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R247	ERJ3GEYJ271V	Metal	270 ohms 1/16W
R248,249	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R250	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R251	ERJ3GEYJ563V	Metal	56K ohms 1/16W
R252	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R253	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R254	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R255	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R256,257	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R258	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R259	ERJ3GEYJ182V	Metal	1.8K ohms 1/16W
R260	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R261	ERJ3GEYJ132V	Metal	1.3K ohms 1/16W
R262	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R263	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R264	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R265,266	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R267	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R268	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R269	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R270	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R271	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R272	ERJ3GEYJ363V	Metal	36K ohms 1/16W
R273	ERJ3GEYJ182V	Metal	1.8K ohms 1/16W
R275	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R276	ERJ3GEYJ684V	Metal	680K ohms 1/16W
R277	ERJ3GEYJ361V	Metal	360 ohms 1/16W
R278	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R280	ERJ3GEYJ394	Metal	390K ohms 1/16W
R281	ERJ3GEY0R00	Metal	0 ohm 1/16W
R288	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R289	ERJ3GEYJ363V	Metal	36K ohms 1/16W
R290	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R291	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R292	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R293	ERJ3GEYJ200V	Metal	20 ohms 1/16W
R294	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R295	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R296	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R297	ERJ3GEYJ391V	Metal	390 ohms 1/16W
R298	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R299	ERJ3GEYJ474V	Metal	470K ohms 1/16W
R309	ERJ3GEY0R00	Metal	0 ohm 1/16W
R310	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R311,312	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R313,314	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R315-322	ERJ3GEYJ471V	Metal	470 ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R323,324	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R325-328	ERJ3GEY0R00	Metal	0 ohm 1/16W
R329,330	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R341	ERJ3GEY0R00	Metal	0 ohm 1/16W
R342,343	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R344	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R346	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R347	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R348	ERJ3GEY0R00	Metal	0 ohm 1/16W
R349	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R350	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R351,352	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R353	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R354	ERJ3GEY0R00	Metal	0 ohm 1/16W
R359	ERJ3GEYJ201V	Metal	200 ohms 1/16W
R360	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R361	ERJ3GEY0R00	Metal	0 ohm 1/16W
R362	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R363,364	ERJ3GEYJ151V	Metal	150 ohms 1/16W
R365-369	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R370	ERJ3GEY0R00	Metal	0 ohm 1/16W
R371	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R375	ERJ3GEY0R00	Metal	0 ohm 1/16W
R376	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R377	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R378	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R379,380	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R381	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R384	ERJ3GEYJ123V	Metal	12K ohms 1/16W
R385	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R386	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R387	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R388	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R389	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R390	ERJ3GEYJ112V	Metal	1.1K ohms 1/16W
R391	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R392	ERJ3GEYJ471V	Metal	470 ohms 1/16W
R400,401	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R402-409	ERJ3GEYJ511V	Metal	510 ohms 1/16W
R411	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R413	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R414	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R415	ERJ3GEY0R00	Metal	0 ohm 1/16W
R417	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R418-421	ERJ3GEY0R00	Metal	0 ohm 1/16W
R422	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R430	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R431	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R433	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R434	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R435,436	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R437	ERJ3GEY0R00	Metal	0 ohm 1/16W
R438	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R439	ERJ3GEY0R00	Metal	0 ohm 1/16W
R440	ERJ3GEYJ223V	Metal	22K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R441	ERJ3GEYJ201V	Metal	200 ohms 1/16W
R442	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R443,444	ERJ3GEYJ151V	Metal	150 ohms 1/16W
R445	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R446	ERJ3GEY0R00	Metal	0 ohm 1/16W
R447,450	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R451	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R453	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R455	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R456	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R457	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R460	ERJ3GEY0R00	Metal	0 ohm 1/16W
R461	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R462	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R463	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R465	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R466	ERJ3GEYJ112V	Metal	1.1K ohms 1/16W
R467	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R468	ERJ3GEYJ471V	Metal	470 ohms 1/16W
R469	ERJ3GEYJ202V	Metal	2K ohms 1/16W
R470	ERJ3GEYJ822V	Metal	8.2K ohms 1/16W
R471	ERJ3GEY0R00	Metal	0 ohm 1/16W
R472	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R473,474	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R475	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R476	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R477	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R478	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R479	ERJ3GEYJ151V	Metal	150 ohms 1/16W
R480	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R501-509	YWR0816P242D	Metal	2.4K ohms 1/16W
R510-516	YWR0816P122D	Metal	1.2K ohms 1/16W
R517-525	YWR0816P242D	Metal	2.4K ohms 1/16W
R526-532	YWR0816P122D	Metal	1.2K ohms 1/16W
R533	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R534	ERJ3GEYJ621V	Metal	620 ohms 1/16W
R535	ERJ3GEYJ362V	Metal	3.6K ohms 1/16W
R536	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R537	ERJ3GEYJ751V	Metal	750 ohms 1/16W
R538	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R539	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R540	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R541	ERJ3GEYJ471V	Metal	470 ohms 1/16W
R542	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R543	ERJ3GEYJ122V	Metal	1.2K ohms 1/16W
R544,545	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R546	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R547	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R548	ERJ3GEYJ473V	Metal	47K ohms 1/16W
R549	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R550	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R551	ERJ3GEYJ682V	Metal	6.8K ohms 1/16W
R552	ERJ3GEYJ271V	Metal	270 ohms 1/16W
R553	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R554	ERJ3GEYJ202V	Metal	2K ohms 1/16W
R555	ERJ3GEYJ242V	Metal	2.4K ohms 1/16W
R556	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R557	ERJ3GEYJ202V	Metal	2K ohms 1/16W
R558	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R559,560	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R561	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R562	ERJ3GEYJ242V	Metal	2.4K ohms 1/16W
R601-609	YWR0816P242D	Metal	2.4K ohms 1/16W
R610-616	YWR0816P122D	Metal	1.2K ohms 1/16W
R617	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R618	ERJ3GEYJ621V	Metal	620 ohms 1/16W
R619	ERJ3GEYJ751V	Metal	750 ohms 1/16W
R620	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R621	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R622	ERJ3GEYJ471V	Metal	470 ohms 1/16W
R623	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R624	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R625	ERJ3GEYJ272V	Metal	2.7K ohms 1/16W
R626	ERJ3GEYJ122V	Metal	1.2K ohms 1/16W
R627	ERJ3GEYJ560V	Metal	56 ohms 1/16W
R628	ERJ3GEY0R00	Metal	0 ohm 1/16W
R629	ERJ3GEYJ362V	Metal	3.6K ohms 1/16W
R630	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R632-640	YWR0816P242D	Metal	2.4K ohms 1/16W
R641-647	YWR0816P122D	Metal	1.2K ohms 1/16W
R648	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R700,701	ERJ3GEY0R00	Metal	0 ohm 1/16W
R703,704	ERJ3GEY0R00	Metal	0 ohm 1/16W
R706,707	ERJ3GEY0R00	Metal	0 ohm 1/16W
R709,712	ERJ3GEY0R00	Metal	0 ohm 1/16W
R713	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R714	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R715	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R716	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R717	ERJ3GEYJ154V	Metal	150K ohms 1/16W
R718	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R719	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R727	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R728	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R729	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R730	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R731	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R732	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R733	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R734	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R735	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R736	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R737	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R738	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R739	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R740	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R741	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R742	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R743	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R744	ERJ3GEYJ101V	Metal	100 ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R745	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R746	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R747	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R748	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R749	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R750	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R751	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R752	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R753	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R754	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R755	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R756	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R757	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R758	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R759	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R760	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R761	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R762	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R763	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R764	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R765	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R766	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R767	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R768	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R769	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R770	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R771	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R772	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R773	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R774	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R775	ERJ6GEYJ471V	Metal	470 ohms 1/10W
R776	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R777	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R778-794	YWR1220Q750D	Metal	75 ohms 1/10W
R795	ERJ3GEY0R00	Metal	0 ohm 1/16W
R797	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R798	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R799	ERJ3GEYJ154V	Metal	150K ohms 1/16W
R800	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R801,802	ERJ3GEY0R00	Metal	0 ohm 1/16W
R803,804	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R805	ERJ3GEYJ473V	Metal	47K ohms 1/16W
R806	ERJ3GEYJ273V	Metal	27K ohms 1/16W
R807-816	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R817	ERJ3GEYJ105V	Metal	1M ohms 1/16W
R818	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R821	ERJ3GEY0R00	Metal	0 ohm 1/16W
R835	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R837	ERJ3GEY0R00	Metal	0 ohm 1/16W
R838,839	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R841,844	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R845,847	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R849	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R850	ERJ3GEY0R00	Metal	0 ohm 1/16W
R851	ERJ3GEYJ102V	Metal	1K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R852	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R853,855	ERJ3GEY0R00	Metal	0 ohm 1/16W
R856	ERJ3GEY0R00	Metal	0 ohm 1/16W
R857,858	ERJ3GEYJ431	Metal	430 ohms 1/16W
R859	ERJ3GEY0R00	Metal	0 ohm 1/16W
R862	YWR0816P682D	Metal	6.8K ohms 1/16W
R863	YWR0816P302D	Metal	3K ohms 1/16W
R864	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R865	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R866-886	ERJ3GEYJ121V	Metal	120 ohms 1/16W
R887	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R888	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R889	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R890	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R891	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R892	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R893	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R894	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R895	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R896	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R897	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R898	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R899	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R900	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R904	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R905	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R906	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R907	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R908	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R909	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R910	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R911	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R912	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R913	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R914	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R915	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R916	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R917	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R918	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R919	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R920	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R921	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R922	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R923	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R924	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R925	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R926	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R927	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R928	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R929	ERJ3GEYJ564V	Metal	560K ohms 1/16W
R930	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R931	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R932	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R933	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R934	ERJ3GEYJ393V	Metal	39K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R935	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R936	ERJ3GEYJ562V	Metal	5.6K ohms 1/16W
R937	ERJ3GEYJ563V	Metal	56K ohms 1/16W
R938,939	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R940	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R941	ERJ3GEYJ393V	Metal	39K ohms 1/16W
R942	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R951	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R952	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R953	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R954	YWR0816P222D	Metal	2.2K ohms 1/16W
R955	YWR0816P102D	Metal	1K ohms 1/16W
R956	ERJ3GEYJ123V	Metal	12K ohms 1/16W
R957	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R958	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R959	ERJ3GEYJ392V	Metal	3.9K ohms 1/16W
R960	ERJ3GEYJ331V	Metal	330 ohms 1/16W
R961	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R962	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R963	ERJ3GEYJ752V	Metal	7.5K ohms 1/16W
R964,965	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R966	ERJ3GEYJ472V	Metal	4.7K ohms 1/16W
R967	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R968	ERJ3GEYJ154V	Metal	150K ohms 1/16W
R969	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R970	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R971	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R972	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R973	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R974	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R975	ERJ3GEYJ561V	Metal	560 ohms 1/16W
R976	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R977	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R978	ERJ3GEYJ152V	Metal	1.5K ohms 1/16W
R979	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R980	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R981	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R982	ERJ3GEYJ104V	Metal	100K ohms 1/16W
R983	ERJ3GEYJ224V	Metal	220K ohms 1/16W
R984	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R1102	ERJ3GEYJ363V	Metal	36K ohms 1/16W
R1103	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1104	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R1105	ERJ3GEYJ512V	Metal	5.1K ohms 1/16W
R1106	ERJ3GEYJ300	Metal	30 ohms 1/16W
R1107	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1108	ERJ3GEYJ684V	Metal	680K ohms 1/16W
R1109	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R1110	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R1111,1112	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1113	ERJ3GEYJ332V	Metal	3.3K ohms 1/16W
R1114	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1115	ERJ3GEYJ102V	Metal	1K ohms 1/16W
R1116	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R1117	ERJ3GEYJ473V	Metal	47K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R1118	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1119	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R1201,1202	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1203	ERJ3GEYJ302V	Metal	3K ohms 1/16W
R1204	ERJ3GEYJ103V	Metal	10K ohms 1/16W
R1205	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R1207	ERJ3GEYJ273V	Metal	27K ohms 1/16W
R1208	ERJ3GEYJ362V	Metal	3.6K ohms 1/16W
R1209	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R1210	YWR0816R134D	Metal	130K ohms 1/16W
R1211	ERJ3GEYJ221V	Metal	220 ohms 1/16W
R1212	YWR0816P183D	Metal	18K ohms 1/16W
R1213	ERJ3GEYJ363V	Metal	36K ohms 1/16W
R1214	ERJ3GEYJ153V	Metal	15K ohms 1/16W
R1215	ERJ3GEYJ101V	Metal	100 ohms 1/16W
R1216	ERJ3GEYJ154V	Metal	150K ohms 1/16W
R1217	ERJ3GEYJ222V	Metal	2.2K ohms 1/16W
R1218	YWR0816R184D	Metal	180K ohms 1/16W
R1219-1221	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R1222,1224	ERJ3GEY0R00	Metal	0 ohm 1/16W
R1226-1228	ERJ3GEYJ223V	Metal	22K ohms 1/16W
R1229,1230	ERJ3GEY0R00	Metal	0 ohm 1/16W
R1500(L102)	ERJ14Y0R00H	Metal	0 ohm
VR101	EVM1DSW30B13	Varable Resistor	1K ohms
VR102	EVM1DSW30BE2	Variable Resistor	220K ohms
VR103,200	EVM1DSW30B13	Variable Resistor	1K ohms
VR201	EVM1DSW30B14	Variable Resistor	10K ohms
VR202	EVM1DSW30B13	Variable Resistor	1K ohms
VR400	EVM1DSW30B14	Variable Resistor	10K ohms
VR501	EVM1DSW30B53	Variable Resistor	5K ohms
VR502	EVM1DSW30B13	Variable Resistor	1K ohms
VR601	EVM1DSW30B53	Variable Resistor	5K ohms
VR602	EVM1DSW30B13	Variable Resistor	1K ohms
Z101-104	EXBV8V680JV	Block Resistor	68 ohms
C101	F2G0J6810002	Electrolytic	680 µF 6.3V
C102	EEVHB0J101P	Electrolytic	100 µF 6.3V
C104	F1H1H330A231	Ceramic	33 pF
C105	F1H1H300A004	Ceramic	30 pF
C107	F1H1H390A004	Ceramic	39 pF
C108	F1H1A105A004	Ceramic	1 µF
C109	F1H0J105A001	Ceramic	1 µF
C110	F1H1H102A004	Ceramic	1000 pF
C111	MCUV1E104ZFV	Ceramic	0.1 µF
C114	F1H1H103A190	Ceramic	0.01 µF
C116	MCUV1E104ZFV	Ceramic	0.1 µF
C117	F1H1H103A190	Ceramic	0.01 µF
C118-125	MCUV1E104ZFV	Ceramic	0.1 µF
C126	EEVHB0J101P	Electrolytic	100 µF 6.3V
C127	F1H1H240A004	Ceramic	24 pF
C128	F1H1H3610001	Ceramic	360 pF
C129	F1H1H103A190	Ceramic	0.01 µF
C130	F1H1H102A004	Ceramic	1000 pF
C131	MCUV1E104ZFV	Ceramic	0.1 µF
C133	F1H1H103A190	Ceramic	0.01 µF
C135	F1H1A474A025	Ceramic	0.47 µF

REF. NO.	PART NO.	DESCRIPTION	
C136,137	MCUV1E104ZFV	Ceramic	0.1 µF
C138	F1H1H102A004	Ceramic	1000 pF
C139	F1H1H103A190	Ceramic	0.01 µF
C140	F1H1H221A004	Ceramic	220 pF
C141-143	MCUV1E104ZFV	Ceramic	0.1 µF
C170	F1H1H220A004	Ceramic	22 pF
C173	F1H1A105A004	Ceramic	1 µF
C174	F1H1H240A004	Ceramic	24 pF
C175	F1H0J105A001	Ceramic	1 µF
C176	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C178	MCUV1E104ZFV	Ceramic	0.1 µF
C179	F1H1H102A004	Ceramic	1000 pF
C180	F1H1H101A004	Ceramic	100 pF
C181	F1H1A105A004	Ceramic	1 µF
C182	F1H1H331A650	Ceramic	330 pF
C183	F1H1H102A004	Ceramic	1000 pF
C200	F1H1H160A004	Ceramic	16 pF
C201	F1H1H101A004	Ceramic	100 pF
C202	MCUV1H470JCV	Ceramic	47 pF
C204	EEVHB0J101P	Electrolytic	100 µF 6.3V
C205	MCUV1E104ZFV	Ceramic	0.1 µF
C206	F1H1A105A004	Ceramic	1 µF
C208	EEVHB0J101P	Electrolytic	100 µF 6.3V
C210-213	MCUV1E104ZFV	Ceramic	0.1 µF
C215	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C216	F1H1H240A004	Ceramic	24 pF
C217	F1H1H3610001	Ceramic	360 pF
C218	MCUV1E104ZFV	Ceramic	0.1 µF
C219	F1H1E333A002	Ceramic	0.033 µF
C220	F1H1H101A004	Ceramic	100 pF
C222-225	MCUV1E104ZFV	Ceramic	0.1 µF
C226	EEVHB0J101P	Electrolytic	100 µF 6.3V
C227	F1H1H102A004	Ceramic	1000 pF
C228	F1H1H103A190	Ceramic	0.01 µF
C229	F1H1H102A004	Ceramic	1000 pF
C230	F1H1A105A004	Ceramic	1 µF
C231-234	MCUV1E104ZFV	Ceramic	0.1 µF
C235	F1H1C5630001	Ceramic	0.056 µF
C236	F1H1H560A004	Ceramic	56 pF
C237	F1H1A474A025	Ceramic	0.47 µF
C238	MCUV1E104ZFV	Ceramic	0.1 µF
C239	F1H1H221A004	Ceramic	220 pF
C241	F1H1H331A650	Ceramic	330 pF
C242	F1H1H221A004	Ceramic	220 pF
C243,244	MCUV1E104ZFV	Ceramic	0.1 µF
C245	F1H1A105A004	Ceramic	1 µF
C246	F1H1H102A004	Ceramic	1000 pF
C247,251	MCUV1E104ZFV	Ceramic	0.1 µF
C253	F2G0J6810002	Electrolytic	680 µF 6.3V
C254	EEVHB0J101P	Electrolytic	100 µF 6.3V
C255	MCUV1E104ZFV	Ceramic	0.1 µF
C256	F1H1H102A004	Ceramic	1000 pF
C257	F1H1H101A004	Ceramic	100 pF
C258	F1H1H332A013	Ceramic	3300 pF
C259	F1H1H152A013	Ceramic	1500 pF
C260,261	F1H1A105A004	Ceramic	1 µF
C262	MCUV1H470JCV	Ceramic	47 pF
C263	MCUV1E104ZFV	Ceramic	0.1 µF
C264	F1H1H102A004	Ceramic	1000 pF
C265	F1H1H3010001	Ceramic	300 pF
C266	F1H1H221A004	Ceramic	220 pF
C267	F1H1H391A004	Ceramic	390 pF
C269	MCUV1E104ZFV	Ceramic	0.1 µF
C270	F1H1H102A004	Ceramic	1000 pF
C271	F1H1H391A004	Ceramic	390 pF
C272	MCUV1E104ZFV	Ceramic	0.1 µF
C275	F1H1A105A004	Ceramic	1 µF
C276	F1H1H101A004	Ceramic	100 pF
C277	MCUV1E104ZFV	Ceramic	0.1 µF
C278	F1H1H123A190	Ceramic	0.012 pF
C279-281	MCUV1E104ZFV	Ceramic	0.1 µF
C282	F1H1H101A004	Ceramic	100 pF
C283,284	MCUV1E104ZFV	Ceramic	0.1 µF
C285	F1H1H101A004	Ceramic	100 pF
C286	MCUV1E104ZFV	Ceramic	0.1 µF
C307	F1H1H471A650	Ceramic	470 pF
C308	MCUV1H820JCV	Ceramic	82 pF
C310	F1H1H471A650	Ceramic	470 pF
C312	EEVHB0J101P	Electrolytic	100 µF 6.3V
C313-315	MCUV1E104ZFV	Ceramic	0.1 µF
C316	EEVHB0J101P	Electrolytic	100 µF 6.3V
C317-324	MCUV1E104ZFV	Ceramic	0.1 µF
C340	EEVHB0J221P	Electrolytic	220 µF 6.3V
C341-347	MCUV1E104ZFV	Ceramic	0.1 µF
C352	F1H1C104A001	Ceramic	0.1 µF
C353	F1H1H222A013	Ceramic	2200 pF
C354	F1H1H331A650	Ceramic	330 pF
C355,356	F1H1H240A004	Ceramic	24 pF
C357	MCUV1H820JCV	Ceramic	82 pF
C358	F1H1H331A650	Ceramic	330 pF
C363	F1H1H103A190	Ceramic	0.01 µF
C364	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C365,366	MCUV1E104ZFV	Ceramic	0.1 µF
C371	F1H1A105A004	Ceramic	1 µF
C372	F1H1H331A650	Ceramic	330 pF
C373	F1H1H5R00001	Ceramic	5 pF
C374	F1H1H331A650	Ceramic	330 pF
C375	F1H1H680A004	Ceramic	68 pF
C378	F1H1H331A650	Ceramic	330 pF
C379-389	MCUV1E104ZFV	Ceramic	0.1 µF
C390	EEVHB0J101P	Electrolytic	100 µF 6.3V
C392	F1H1H102A004	Ceramic	1000 pF
C400	EEVHB0J101P	Electrolytic	100 µF 6.3V
C401-403	MCUV1E104ZFV	Ceramic	0.1 µF
C404	EEVHB0J101P	Electrolytic	100 µF 6.3V
C405	MCUV1E104ZFV	Ceramic	0.1 µF
C408,410	F1H1H471A650	Ceramic	470 pF
C413-419	MCUV1E104ZFV	Ceramic	0.1 µF
C430	F1H1C104A001	Ceramic	0.1 µF
C431	F1H1H222A013	Ceramic	2200 pF

REF. NO.	PART NO.	DESCRIPTION	
C432	F1H1H331A650	Ceramic	330 pF
C433,434	F1H1H100A017	Ceramic	10 pF
C435,436	F1H1H331A650	Ceramic	330 pF
C437	F1H1H103A190	Ceramic	0.01 µF
C438	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C439-451	MCUV1E104ZFV	Ceramic	0.1 µF
C452	EEVHB0J101P	Electrolytic	100 µF 6.3V
C453-455	MCUV1E104ZFV	Ceramic	0.1 µF
C456	F1H1E154A004	Ceramic	0.15 µF
C457,458	MCUV1E104ZFV	Ceramic	0.1 µF
C459	F1H1E333A002	Ceramic	0.033 µF
C460	F1H1H222A013	Ceramic	2200 pF
C461,462	MCUV1E104ZFV	Ceramic	0.1 µF
C463	F1H1H102A004	Ceramic	1000 pF
C465,468	F1H1H222A013	Ceramic	2200 pF
C469	F1H1A474A025	Ceramic	470 pF
C470	MCUV1E104ZFV	Ceramic	0.1 µF
C472,474	F1H1H331A650	Ceramic	330 pF
C475	F1H1H560A004	Ceramic	56 pF
C476	F1H1E154A004	Ceramic	0.15 µF
C503	F1H1H240A004	Ceramic	24 pF
C504	F1H1H101A004	Ceramic	100 pF
C505	F1H1H3610001	Ceramic	360 pF
C506	MCUV1E104ZFV	Ceramic	0.1 µF
C507,508	EEVHB0J101P	Electrolytic	100 µF 6.3V
C512	MCUV1E104ZFV	Ceramic	0.1 µF
C513	EEVHB0J101P	Electrolytic	100 µF 6.3V
C514	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C515	F1H1A105A004	Ceramic	1 µF
C516,517	MCUV1E104ZFV	Ceramic	0.1 µF
C518	EEVHB0J101P	Electrolytic	100 µF 6.3V
C519-521	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C602	F1H1H240A004	Ceramic	24 pF
C603	F1H1H101A004	Ceramic	100 pF
C604	F1H1H3610001	Ceramic	360 pF
C605	MCUV1E104ZFV	Ceramic	0.1 µF
C606,607	EEVHB0J101P	Electrolytic	100 µF 6.3V
C611,612	EEVHB0J101P	Electrolytic	100 µF 6.3V
C635	F1H1H331A650	Ceramic	330 pF
C636	F1H1A105A004	Ceramic	1 µF
C700-702	MCUV1E104ZFV	Ceramic	0.1 µF
C703	EEVHB0J101P	Electrolytic	100 µF 6.3V
C704-706	MCUV1E104ZFV	Ceramic	0.1 µF
C707	EEVHB0J101P	Electrolytic	100 µF 6.3V
C708	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C709-712	MCUV1E104ZFV	Ceramic	0.1 µF
C713	EEVHB0J101P	Electrolytic	100 µF 6.3V
C714	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C715-718	MCUV1E104ZFV	Ceramic	0.1 µF
C719	EEVHB0J221P	Electrolytic	220 µF 6.3V
C729	MCUV1E104ZFV	Ceramic	0.1 µF
C730	EEVHB0J101P	Electrolytic	100 µF 6.3V
C731	MCUV1E104ZFV	Ceramic	0.1 µF
C732	EEVHB0J101P	Electrolytic	100 µF 6.3V
C733	MCUV1E104ZFV	Ceramic	0.1 µF
C734	EEVHB0J101P	Electrolytic	100 µF 6.3V
C735	MCUV1E104ZFV	Ceramic	0.1 µF
C736	EEVHB0J101P	Electrolytic	100 µF 6.3V
C737	MCUV1E104ZFV	Ceramic	0.1 µF
C738	EEVHB0J101P	Electrolytic	100 µF 6.3V
C739	MCUV1E104ZFV	Ceramic	0.1 µF
C740	EEVHB0J101P	Electrolytic	100 µF 6.3V
C741	MCUV1E104ZFV	Ceramic	0.1 µF
C742	EEVHB0J101P	Electrolytic	100 µF 6.3V
C743	MCUV1E104ZFV	Ceramic	0.1 µF
C744	EEVHB0J101P	Electrolytic	100 µF 6.3V
C745	MCUV1E104ZFV	Ceramic	0.1 µF
C746	EEVHB0J101P	Electrolytic	100 µF 6.3V
C747	MCUV1E104ZFV	Ceramic	0.1 µF
C748	EEVHB0J101P	Electrolytic	100 µF 6.3V
C749	MCUV1E104ZFV	Ceramic	0.1 µF
C750	EEVHB0J101P	Electrolytic	100 µF 6.3V
C751	MCUV1E104ZFV	Ceramic	0.1 µF
C752	EEVHB0J101P	Electrolytic	100 µF 6.3V
C753	MCUV1E104ZFV	Ceramic	0.1 µF
C754	EEVHB0J101P	Electrolytic	100 µF 6.3V
C755	MCUV1E104ZFV	Ceramic	0.1 µF
C756	EEVHB0J101P	Electrolytic	100 µF 6.3V
C757	MCUV1E104ZFV	Ceramic	0.1 µF
C758	EEVHB0J101P	Electrolytic	100 µF 6.3V
C759	MCUV1E104ZFV	Ceramic	0.1 µF
C760	EEVHB0J101P	Electrolytic	100 µF 6.3V
C761	EEVHB0J221P	Electrolytic	220 µF 6.3V
C762	MCUV1E104ZFV	Ceramic	0.1 µF
C763,764	EEVHB0J101P	Electrolytic	100 µF 6.3V
C765,770	MCUV1E104ZFV	Ceramic	0.1 µF
C780-782	MCUV1E104ZFV	Ceramic	0.1 µF
C783	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C784	EEVHB0J101P	Electrolytic	100 µF 6.3V
C791,792	F1H1H101A004	Ceramic	100 pF
C793	F1H1A105A004	Ceramic	1 µF
C794	F1H1H331A650	Ceramic	330 pF
C795	MCUV1E104ZFV	Ceramic	0.1 µF
C800	F1H1H101A004	Ceramic	100 pF
C801	MCUV1E104ZFV	Ceramic	0.1 µF
C802,803	F1H1H101A004	Ceramic	100 pF
C804,805	MCUV1E104ZFV	Ceramic	0.1 µF
C806	F1H1E473A002	Ceramic	0.047 µF
C807	MCUV1E104ZFV	Ceramic	0.1 µF
C842	F1H0J105A001	Ceramic	1 µF
C843	MCUV1E104ZFV	Ceramic	0.1 µF
C844	F1H0J105A001	Ceramic	1 µF
C845	MCUV1E104ZFV	Ceramic	0.1 µF
C848,849	F1H1H300A004	Ceramic	30 pF
C857	F1H1A105A004	Ceramic	1 µF
C858-860	MCUV1E104ZFV	Ceramic	0.1 µF
C861	EEVHB0J101P	Electrolytic	100 µF 6.3V
C862,864	MCUV1E104ZFV	Ceramic	0.1 µF
C865	MCUV1E104ZFV	Ceramic	0.1 µF
C866,867	F1H1H101A004	Ceramic	100 pF

REF. NO.	PART NO.	DESCRIPTION	
C869	EEVHB0J101P	Electrolytic	100 µF 6.3V
C870	MCUV1E104ZFV	Ceramic	0.1 µF
C871	F1H1E223A011	Ceramic	0.022 µF
C872,873	MCUV1E104ZFV	Ceramic	0.1 µF
C874	EEVHB0J101P	Electrolytic	100 µF 6.3V
C875-877	MCUV1E104ZFV	Ceramic	0.1 µF
C878-896	F1H1H103A190	Ceramic	0.01 µF
C897	F1H1A105A004	Ceramic	1 µF
C898	MCUV1E104ZFV	Ceramic	0.1 µF
C899	F1H1A105A004	Ceramic	1 µF
C950	EEVHB0J221P	Electrolytic	220 µF 6.3V
C951	F1H1H130A004	Ceramic	13 pF
C952	EEVHB0J101P	Electrolytic	100 µF 6.3V
C953	F1H0J105A001	Ceramic	1 µF
C954	MCUV1E104ZFV	Ceramic	0.1 µF
C955	F1H1H101A004	Ceramic	100 pF
C956	F1H1A105A004	Ceramic	1 µF
C957	F1H1H331A650	Ceramic	330 pF
C958	F1H1H102A004	Ceramic	1000 pF
C959	MCUV1E104ZFV	Ceramic	0.1 µF
C960	F1H1A105A004	Ceramic	1 µF
C961	F1H1H300A004	Ceramic	30 pF
C962	F1H1H220A004	Ceramic	22 pF
C964	F1H1E223A011	Ceramic	0.022 µF
C965	F1H1H103A190	Ceramic	0.01 µF
C966	EEVHB0J101P	Electrolytic	100 µF 6.3V
C967	F1H1C5630001	Ceramic	0.056 µF
C968,969	MCUV1E104ZFV	Ceramic	0.1 µF
CT400	ECRJA050M11W	Trimmer	
CT401	ECRJA030E11W	Trimmer	
L101	G1C8R2J00002	Coil	8.2 µH
L103	G1C330J00002	Coil	33 µH
L104	G1C100J00001	Coil	10 µH
L105	G1C8R2J00002	Coil	8.2 µH
L106	G1C560J00002	Coil	56 µH
L107	G1C3R9J00002	Coil	3.9 µH
L108	G1C560J00002	Coil	56 µH
L109	G1C8R2J00002	Coil	8.2 µH
L200	G1C560J00002	Coil	56 µH
L201	G1C820J00002	Coil	82 µH
L202	G1C8R2J00002	Coil	8.2 µH
L203	G1C560J00002	Coil	56 µH
L204	G1C3R9J00002	Coil	3.9 µH
L205,206	G1C8R2J00002	Coil	8.2 µH
L300,301	G1C8R2J00002	Coil	8.2 µH
L302	G1C5R6J00001	Coil	5.6 µH
L303	EIC4EJ011E	Coil	
L304,400	G1C8R2J00002	Coil	8.2 µH
L401	EIC4EJ011E	Coil	
L402	G1C5R6J00001	Coil	5.6 µH
L403	G1C8R2J00002	Coil	8.2 µH
L501	G1C560J00002	Coil	56 µH
L502	G1C3R9J00002	Coil	3.9 µH
L503-505	G1C8R2J00002	Coil	8.2 µH
L601	G1C560J00002	Coil	56 µH

REF. NO.	PART NO.	DESCRIPTION	
L602	G1C3R9J00002	Coil	3.9 µH
L603,604	G1C8R2J00002	Coil	8.2 µH
L700-707	G1C8R2J00002	Coil	8.2 µH
L708,709	G1C5R6J00001	Coil	5.6 µH
L801,802	G1C8R2J00002	Coil	8.2 µH
L950,951	G1C8R2J00002	Coil	8.2 µH
L952	G1C330J00002	Coil	33 µH
SW800	ESD11V120	Slide Switch	
X200	YFCSB503F2	Crystal Oscillator	
X300,302	H0J177500007	Crystal Oscillator	
X400	H0J177500007	Crystal Oscillator	
X401	H0J270500003	Crystal Oscillator	
X800	YWCSA7.37MTZ	Crystal Oscillator	
CN300	YW530140810	8-pin Connector	
CN301	YW530141210	12-pin Connector	
CN302	YW530141310	13-pin Connector	
CN303	K1KA14A00025	14-pin Connector	
CN304	YW530141310	13-pin Connector	
CN700	K1KA05A00082	5-pin Connector	
CN701-716 ⚠	K1QBB2CB0003	BNC Connector	
CN717	YWB8BPHKS	8-pin Connector	
BZ800	PKM22EPP4002	Buzzer	
E800-805	YWMEP1866	Terminal	
TP100,201	YWRCT2125TPV	Test-pin	
TP202,303	YWRCT2125TPV	Test-pin	
TP305,306	YWRCT2125TPV	Test-pin	
TP400,405	YWRCT2125TPV	Test-pin	
TP406-408	YWRCT2125TPV	Test-pin	
TP501,502	YWRCT2125TPV	Test-pin	
TP802-805	YW32BM7R5	Test-pin	

ACCESSORY PARTS / PACKAGING PARTS

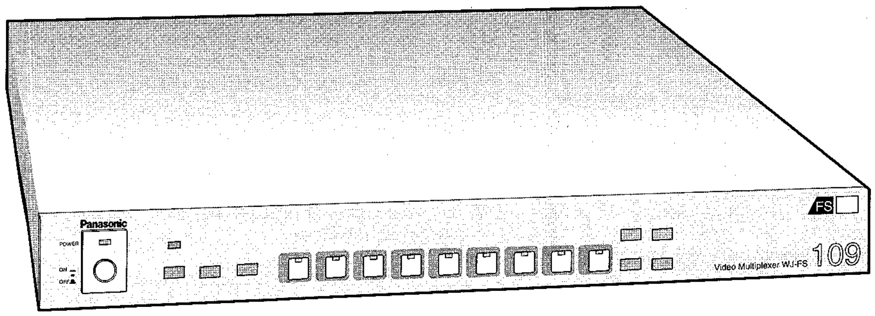
M50	YWA2SA1756A3	Rack Mounting Bracket
M51	XSB3+10FN	Screws M3x10
M52	YWV5EA0505B3	Switch Protector
M53	V8QA5640AN	Operating Instructions
M54	PE26X40C05B	Polyethylene Bag
M55	YWT050803	Polyethylene Bag
M56	V8RA1261AN	Printed Matters
M57	PE55X71C1B	Polyethylene Bag
M58	PE20X25C05B	Polyethylene Bag
M60	V9CA4339AN	Packaging Ass'y

ORDER NO. AVS9911207C8

Service Manual

Video Multiplexer

WJ-FS109/WJ-FS116



SPECIFICATIONS

Power Source :	220 – 240 V AC 50 Hz
Power Consumption :	12 W
Camera Input (1-16)/(1-9)* :	1.0 V[p-p] /75 Ω 2:1 interlaced composite video signal
Playback Input :	1.0 V[p-p] /75 Ω composite video signal
Camera Switching Input :	1 RCA pin jack
Sampling Frequency :	4 fsc 17 MHz
Quantizing :	8 bit
Pixels :	720 x 544
Maximum Refreshing Rate :	4 fields/second
Camera Output (1-16)/(1-9)* :	Looped through Camera Input, 75 Ω automatic termination
Recording Output :	1.0 V[p-p] composite video signal, Multiplexed with Camera ID
Monitor Output :	1.0 V[p-p] /75 Ω composite video signal
Buzzer :	1 Built in
Alarm/Remote Control :	25-pin D-sub Connector
Ambient Operating Temperature :	–10°C - +50°C (14°F - 122°F)
Ambient Operating Humidity :	Less than 90 %
Dimensions :	420 (W) x 44 (H) x 350 (D) mm [16-9/16" (W) x 1-3/4" (H) x 13-3/4" (D)]
Weight :	4 kg (8.8 lbs.)

Dimensions and weight are approximate.
Specifications are subject to change without notice.
Specifications marked with * apply to WJ-FS109.

STANDARD ACCESSORIES

Rack Mounting Bracket	2 pcs.
Screws (M3 x 10)	6 pcs.
Switch Protector	1 pc.

Panasonic

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⚠ WARNING

This service information is designed for experienced repair technicians only and is not designed for use by the general public.
It does not contain warnings or cautions to advise non-technical individuals of potential dangers in attempting to service a product.
Products powered by electricity should be serviced or repaired only by experienced professional technicians. Any attempt to service or repair the product or products dealt with in this service information by anyone else could result in serious injury or death.

CAUTION

RISK OF ELECTRIC SHOCK
DO NOT OPEN

CAUTION:
TO REDUCE THE RISK OF ELECTRIC SHOCK, DO NOT REMOVE COVER.(OR BACK). NO USER SERVICEABLE PARTS INSIDE.
REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.

This symbol warns the user that uninsulated voltage within the unit may have sufficient magnitude to cause electric shock. Therefore, it is dangerous to make any kind of contact with any inside part of this unit.

This symbol alerts the user that important literature concerning the operation and maintenance of this has been included. Therefore, it should be read carefully in order to avoid any problems.

IMPORTANT SAFETY NOTICE

There are special components used in this equipment which are important for safety. These parts are indicated by the "⚠" mark on the schematic diagram and the replacement parts list. It is essential that these critical parts should be replaced with manufacturer's specified parts to prevent X-radiation, shock, fire, or other hazards. Do not modify the original design without permission of manufacture.

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Location of Test Points and Adjusting Controls 6
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WJ-FS116 9

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Main Board (2/2)/BNC Board 11
Front Board 13
Power Board 14

Conductor View

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Front Board 13
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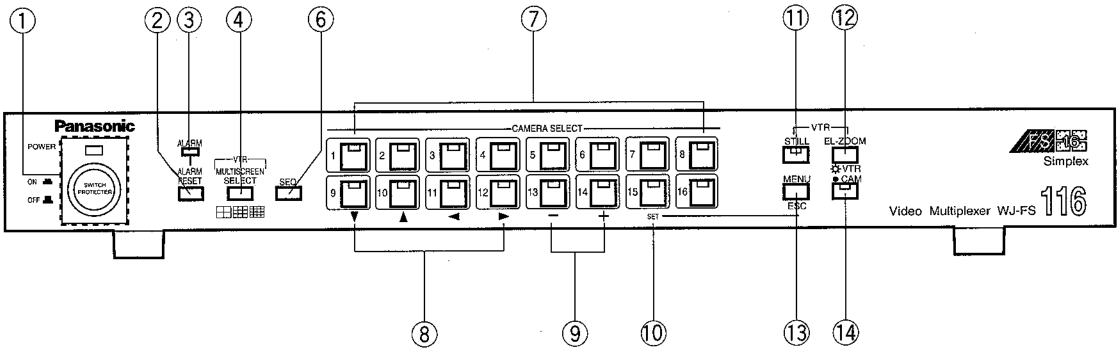
MAJOR OPERATING CONTROLS AND THEIR FUNCTIONS

■ Front View

<WJ-FS116>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POWER
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SWITCH PROTECTOR
ALARM
ALARM RESET
VTR
MULTI SCREEN SELECT
SEQ
CAMERA SELECT
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−
+
SET
VTR
STILL
EL-ZOOM
MENU
ESC
VTR
CAM
Simplex
Video Multiplexer WJ-FS 116
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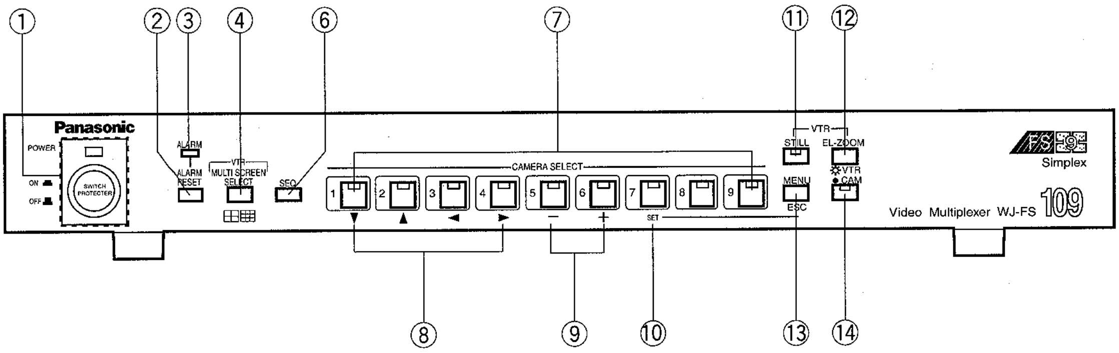
<WJ-FS109>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EL-ZOOM
MENU
ESC
VTR
CAM
Simplex
Video Multiplexer WJ-FS 109
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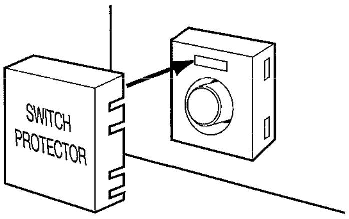
⑬
⑭

① Power Switch (POWER ON / OFF)

This switch turns the power of the video multiplexer on or off. The LED lights up when the power is turned on.

Note: To prevent that the power of the video multiplexer is turned off accidentally, install the supplied switch protector as shown below.


SWITCH PROTECTOR

②Alarm Reset Button (ALARM RESET)

This button resets the active Alarm mode. Pressing this button turns off the Alarm indicator and replaces the "Alarm" indication on the monitor screen with the camera title.

③ Alarm Indicator (ALARM)

This indicator (Red) blinks when an alarm is activated. It changes to steady light when the auto-reset time has elapsed or the alarm recovery signal is received from the VTR. To turn the indicator off, press the **ALARM RESET** button.

④ Multiscreen Selection Button (MULTISCREEN SELECT)

This button selects the multiscreen pattern for the monitor. Multiscreen is available only while the VTR is in playback mode. Pressing this button repeatedly switches patterns as follows:

VTR Playback Picture:

4→9→16→4 screen segments (WJ-FS116)
4→9→4 screen segments (WJ-FS109)

Notes:

- This button does not function in recording mode.
- When ON is selected for QUAD SHIFT on the MONITOR OUTPUT SETUP menu, the screen changes by pressing this button as follows:
  4A→4B→4C→4D→9→16 screen segments (WJ-FS116)
  4A→4B→9 screen segments (WJ-FS109)
  The 4A screen is a compressed picture of channels 1 through 4, the 4B of channels 5 through 8, the 4C of channels 9 through 12, and the 4D of channels 13 through 16. The 9-segment screen shows the pictures of channels 1 through 9 in a 3x3 pattern.

⑥ Sequence Button (SEQ)

This button activates the sequence mode. In this mode, a series of camera pictures is displayed in succession on the monitor screen for the specified duration.

⑦ Camera Selection Buttons (CAMERA SELECT)

These buttons select the camera for live picture or picture recorded on the tape. When the VTR is in playback mode and the LED on the **VTR/CAM** Selection button is on, these buttons select the specified camera picture from the tape for display on the monitor. When the LED is off, the buttons select the live picture of the specified camera.

⑧ Cursor Buttons (▼, ▲, ◄, ►)

These buttons move the cursor in the SETUP MENU of the Video Multiplexer, or select an area for Electronic Zooming.

▼: Downward
▲: Upward
◄: Left
►: Right

⑨ Increment/Decrement Buttons (–, +)

Electronic Zooming is operated with these buttons, Zoom In with the + button and Zoom Out with the – button. During the setup, these buttons are used to select parameters.

⑩ Set Button (SET)

This button executes the selected parameter in the setup menu, and opens a submenu for more detailed settings. Menu items having a submenu are identified by a return symbol at the end of the line.

⑪ Still Button (STILL)

This button selects either still or moving mode for display of the VTR playback on the monitor. Pressing a Camera Selection button will display the corresponding picture either in still or moving mode. When a still picture is displayed, the LED (Green) lights. Pressing the button again restores the moving picture and turns off the LED.

Note: Please note that the tape continues running while the picture is stilled. You may sometimes have to rewind the tape to the desired position.

⑫ Electric Zoom Button (EL-ZOOM)

This button specifies the zooming area in the playback picture. Pressing this button displays the "+" sign representing the centre of the area to be enlarged. While the "+" sign is displayed for 5 seconds, move the "+" sign with the cursor buttons to the desired position and press the Increment (+) button. The designated area is enlarged.

To return to the normal picture press the Decrement (–) or the **EL-ZOOM** button.

⑬ MENU/ESC Button (MENU/ESC)

Pressing this button for 2 seconds or more opens the Setup Menu of the Video Multiplexer. If pressed for less than 1 second, it functions as the Escape button and returns you to the previous menu.

To close the Setup menu when the setup is completed, press the button for 2 seconds.

Notes:

- Make sure to distinguish between 1-second and 2-second operation of this button.
- Opening the Setup menu does not affect the recording signal (REC OUT) output from the rear panel.

⑭ VTR/Camera Selection Button (VTR/CAM)

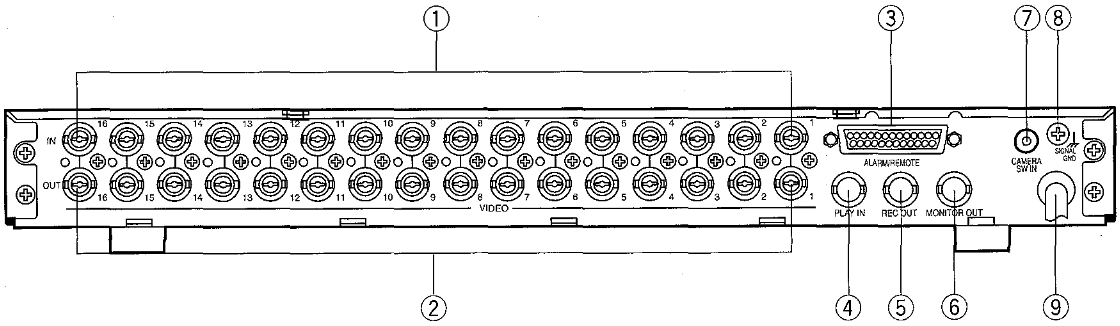
This button selects either VTR playback or the camera picture for display on the monitor. At the same time, it disables or enables recording on the VTR, since the connected VTR performs only playback or recording at a time. The playback picture is displayed on the monitor if you start playing back the VTR while the LED (Green) is on. The camera picture is displayed on the monitor while the LED is off. The camera picture is recorded on the tape if you start the VTR recording.

Notes:

- If PLAYBACK AUTO is set to ON in the setup, pressing this button is ignored, instead this button follows the VTR status automatically. VTR is selected while playing back, and CAMERA is selected during non-playback mode of the VTR.
- There may be a delay of few seconds after switching this button between VTR and CAMERA when PLAYBACK AUTO is ON.
- Blinking of the LED is a warning that the ID code is missing in the playback signal. This may happen when using certain VTR types. In this case, the playback picture goes straight to the monitor instead of through the Video Multiplexer. As a result, the playback picture will not be recognizable unless only a single channel is recorded throughout the tape.

■ Rear View

<WJ-FS116>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1
VIDEO
ALARM/REMOTE
CAMERA SW IN
SIGNAL GND
PLAY IN
REC OUT
MONITOR OUT
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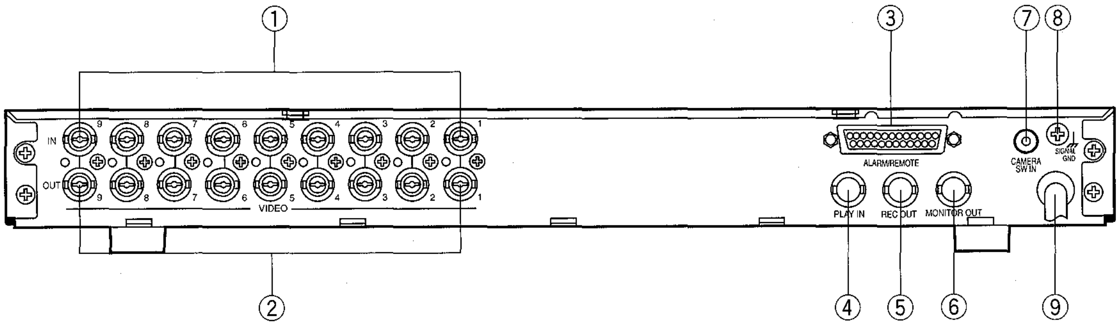
<WJ-FS109>


①
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IN
OUT
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5
4
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1
VIDEO
ALARM/REMOTE
CAMERA SW IN
SIGNAL GND
PLAY IN
REC OUT
MONITOR OUT
②
④
⑤
⑥
⑨

① **Video Input Connectors (VIDEO IN)**
These connectors accept a composite video signal from a camera.

Note: If the input signals have a high jitter content, as in the case of a VTR playback picture, it may not be possible to synchronize this unit.

② **Video Output Connectors (VIDEO OUT)**
The video signals connected to the Video Input Connectors (VIDEO IN) are looped through to these connectors with an automatic 75 Ω termination.

③ **Alarm / Remote Control Connector (ALARM / REMOTE)**
This connector accepts the alarm signals from the associated alarm sensor units and the control signals from the external system.

④ **Playback Input Connector (PLAY IN)**
The playback signal from the time lapse VTR is supplied to this connector.

⑤ **Record Output Connector (REC OUT)**
The recording signal for the time lapse VTR is provided via this connector.

⑥ **Monitor Output Connector (MONITOR OUT)**
The video output signal for the monitor is provided via this connector.

⑦ **Camera Switching Input Connector (CAMERA SW IN)**
The camera switching pulse from the time lapse VTR is supplied to this connector.
The camera switching interval (Sequential Dwell Time) can be synchronized with the time lapse mode set in the associated time lapse VTR.

⑧ **Signal Ground Terminal (SIGNAL GND)**

⑨ **Power Cord**

ADJUSTMENT PROCEDURE

1. Test Equipments Required

- The following Test Equipments are required for adjustment of the Video Multiplexer WJ-FS109/WJ-FS116.
- Underscanned Colour Video Monitor
- Waveform Monitor
- Video Signal Generator
  Ramp Signal (without Carrier)
  Sweep Signal or Multi Burst Signal (more than 10MHz)
- Oscilloscope
- Frequency Counter
- Ceramic Screwdriver

2. Disassembling Procedure for the Adjustment

- Referring to Fig. 2-1, remove eight screws that secure the Upper Cover and remove the Upper Cover.

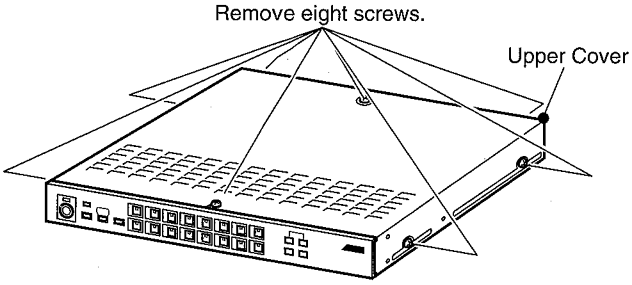


Fig. 2-1

3. Connection and Setting up for Adjustment

3.1. Connection

- Fig. 3-1 shows the connecting diagram for adjustment of the WJ-FS109/WJ-FS116.

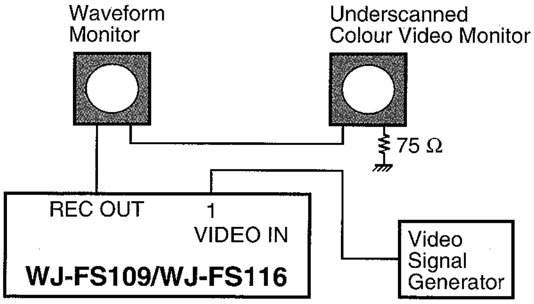


Fig 3-1

- Connect the Underscanned Colour Video Monitor through the Waveform Monitor to the Record Output Connector on the Rear Panel of the WJ-FS109/WJ-FS116.
- Terminate the input terminal of the Underscanned Colour Video Monitor with 75 Ω.
- Connect the Signal Generator to the Video Input Connector 1 on the Rear Panel of the WJ-FS109/WJ-FS116.
- Connect the probe of the Oscilloscope or Frequency Counter at the desired Test Point in each adjustment step.

3.2. Setting Up

- This adjustment should be done after 30 minutes warm up of the WJ-FS109/WJ-FS116.

<Initial Setting>

- Before start to adjust should be done with this Initial Setting as follows:
- Turn the Power Switch off.
- Turn the Power Switch on while pressing the CURSOR Button (►), the DECREMENT Button (–) and MENU Button simultaneously, all LEDs on the Front Panel are lit and enter to the Initial Mode.
- Turn the Power Switch off.

4. Adjustment Procedure

- Refer to the Location of the Test Points and Adjusting Controls on the page 6.

(1). 13.5MHz Frequency Adjustment

Test Point:	**TP505 (13.5MHz)**	**Main Board**
Adjust:	**CT500 (13.5MHz)**	**Main Board**

- Disconnect all input signals from the WJ-FS109/WJ-FS116.
- Connect the Frequency Counter to TP505 and TP307 (GND).

- Turn the Power Switch on while pressing the CURSOR Button (►), the INCREMENT Button (+) and MENU button simultaneously, enter to the Adjustment Mode and all LEDs on the Front Panel are lit, and display the Adjustment Menu as shown in Fig. 4-1.

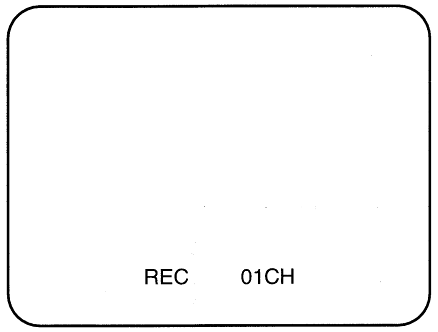


Fig. 4-1

- Adjust CT500 to obtain 13.500000 MHz ± 18 Hz.

(2). ID Level Adjustment

Test Point:	**Record Output Connector**	**Rear Panel**
Adjust:	**VR501 (ID LEVEL)**	**Main Board**

- Connect the terminated Oscilloscope with 75Ω to the Record Output Connector on the Rear Panel.
- Trigger the oscilloscope at V rate.
- Adjust VR501 so that the ID level becomes 700 ± 15 mVp-p as shown in Fig. 4-2.

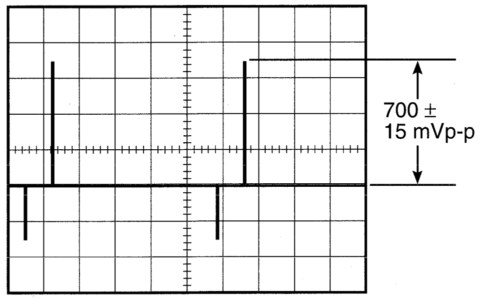


Fig. 4-2

(3). G/L PLL DC Level Adjustment

Test Point:	**TP508 (G/L PLL DC)**	**Main Board**
Adjust:	**L500 (G/L PLL DC)**	**Main Board**

- Supply the Ramp signal to the Video Input Connector 1 on the Rear Panel.
- Connect the Oscilloscope to TP508.
- Set the Input Selector of the Oscilloscope to DC Mode.
- Adjust L500 to obtain 2.0 ± 0.3 V DC.

(4). Y Level Adjustment and Y Pedestal Adjustment

Test Point:	**Record Output Connector**	**Rear Panel**
Adjust:	**VR400 (Y-GAIN)**	**Main Board**
	VR404 (Y-PEDESTAL)	**Main Board**

- Supply the Ramp signal to the Video Input Connector 1 on the Rear Panel.
- Connect the terminated Oscilloscope with 75Ω to the Record Output Connector on the Rear Panel.
- Adjust VR404 so that the Luminance Pedestal level becomes 0 $^{+7}_{-0}$ mV as shown in Fig. 4-3.
- Adjust VR400 so that the Luminance level becomes 700 ± 15 mVp-p as shown in Fig. 4-3.

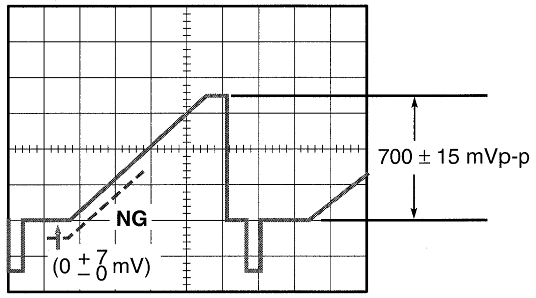
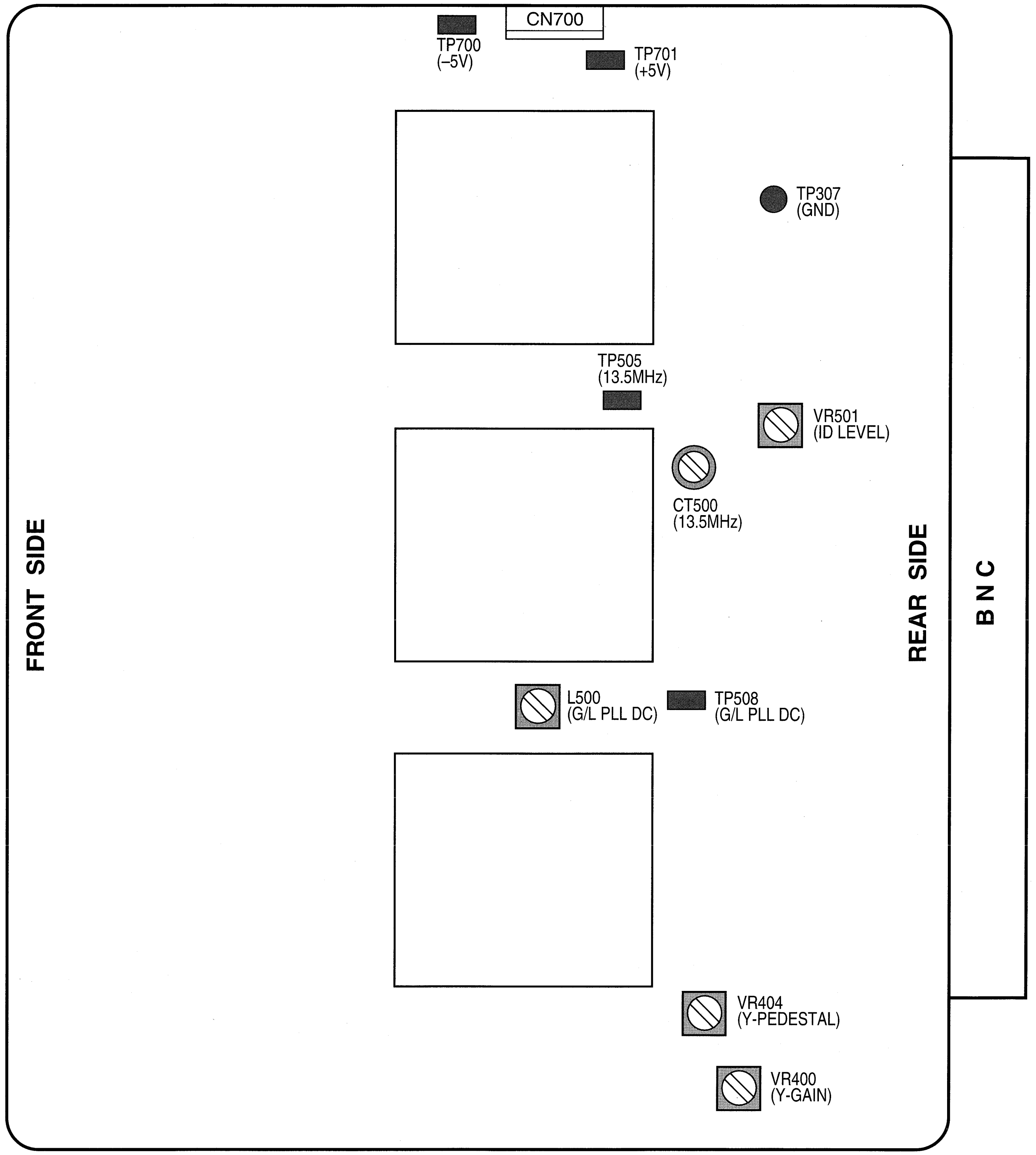


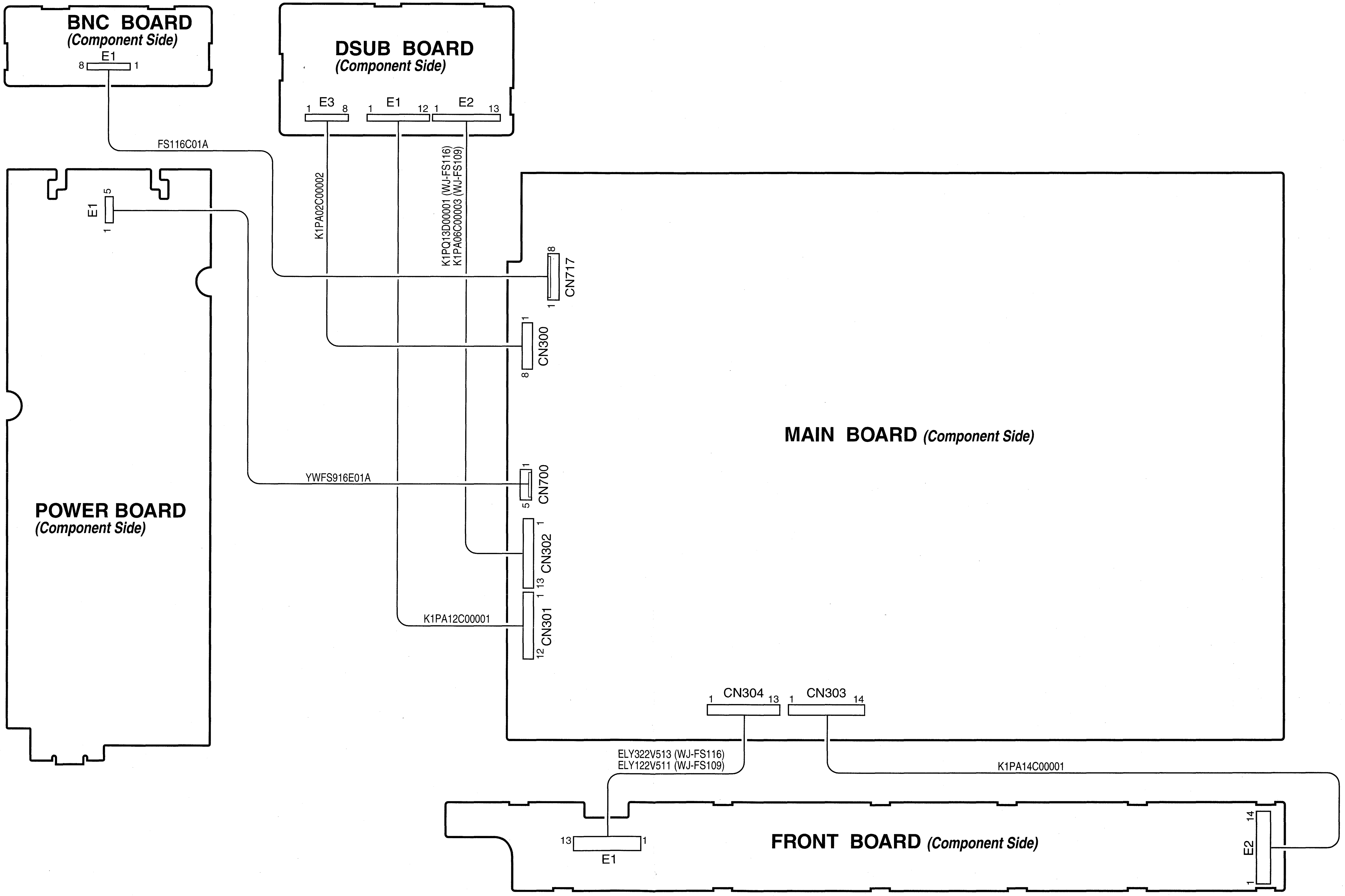
Fig. 4-3

LOCATION OF TEST POINTS AND ADJUSTING CONTROLS

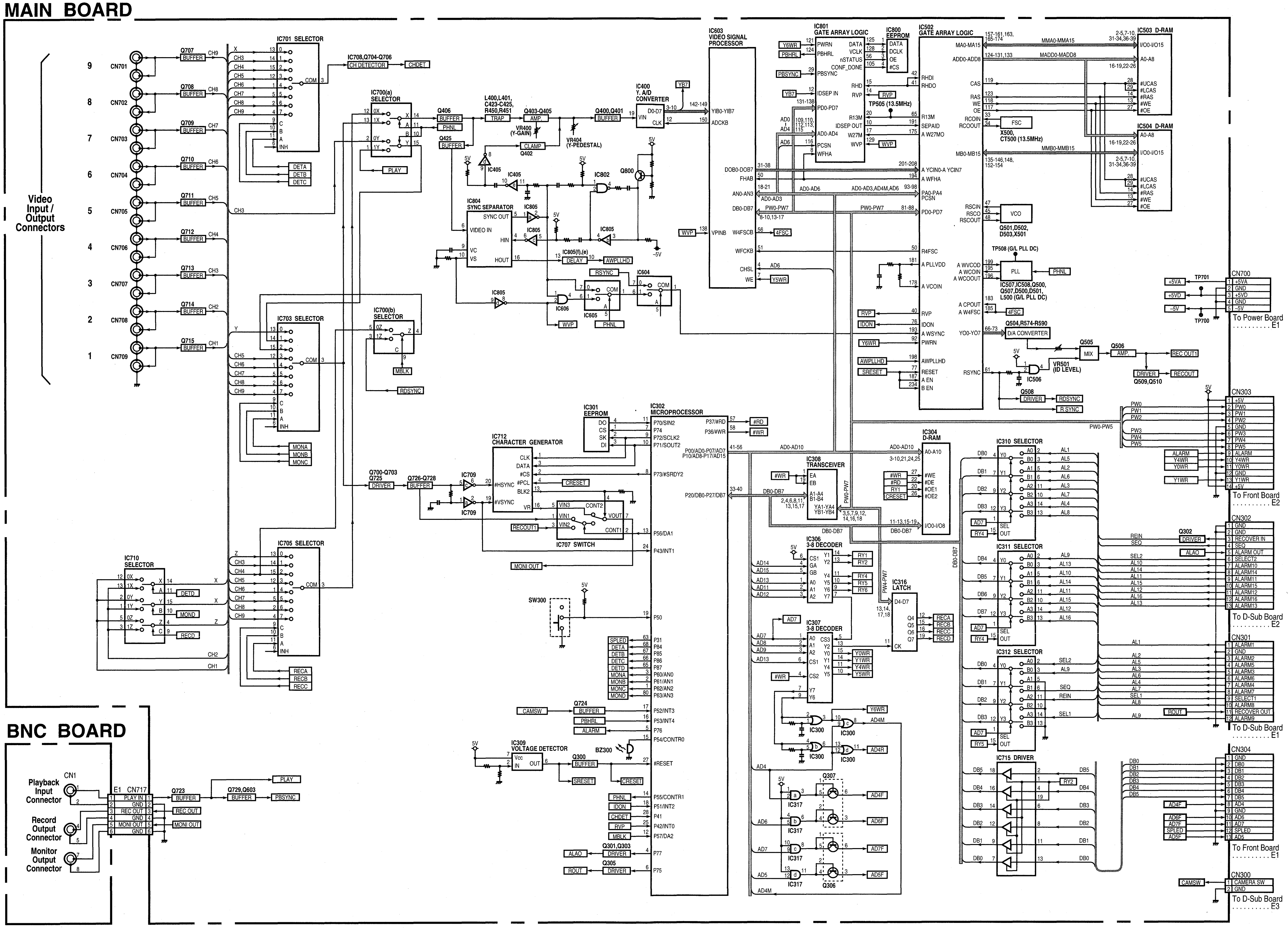
MAIN BOARD (COMPONENT SIDE)


CN700
TP700
(–5V)
TP701
(+5V)
TP307
(GND)
TP505
(13.5MHz)
VR501
(ID LEVEL)
CT500
(13.5MHz)
FRONT SIDE
REAR SIDE
BNC
L500
(G/L PLL DC)
TP508
(G/L PLL DC)
VR404
(Y-PEDESTAL)
VR400
(Y-GAIN)

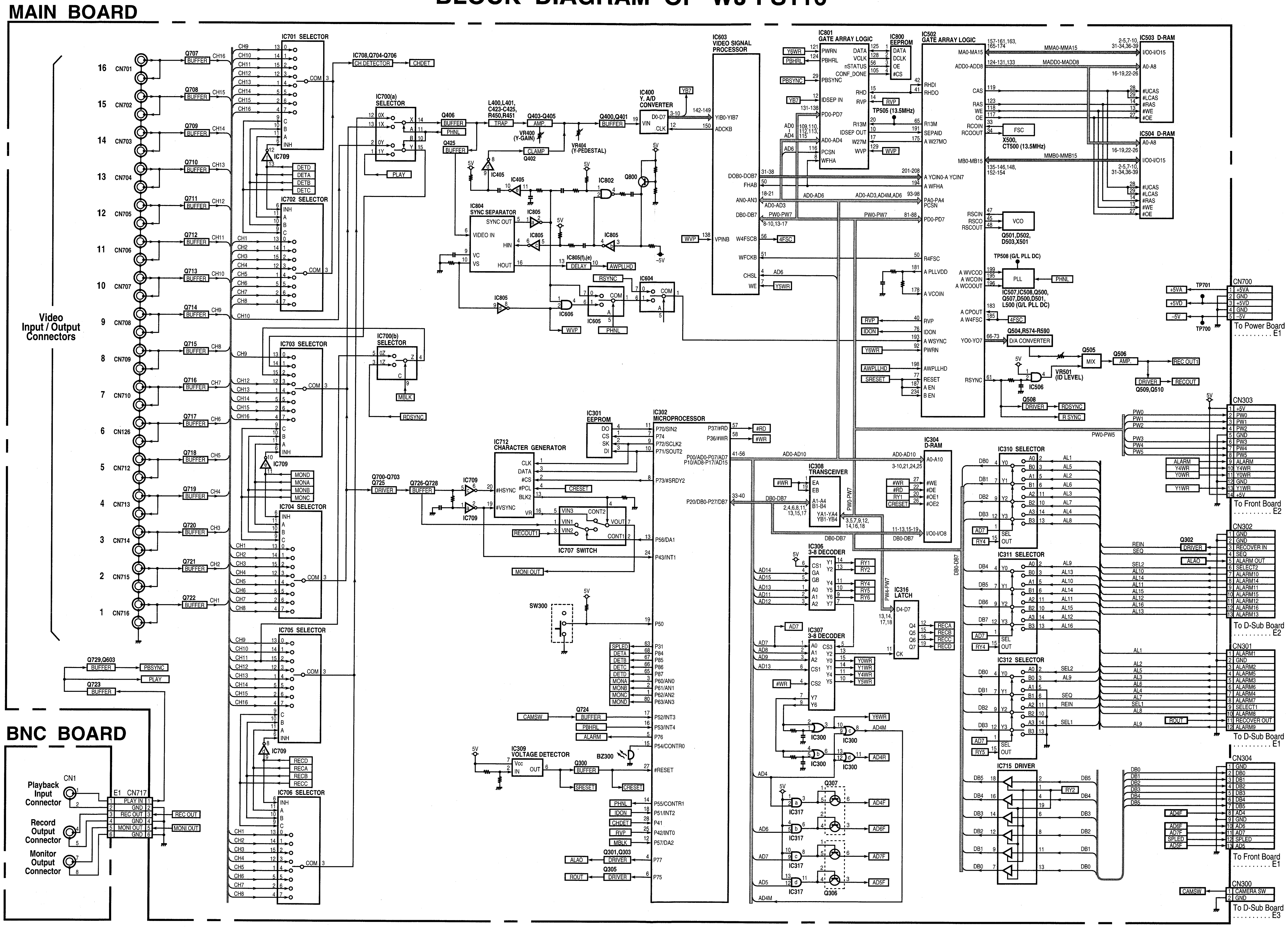
WIRING DIAGRAM


BNC BOARD
(Component Side)
E1
8
1
FS116C01A
DSUB BOARD
(Component Side)
E3
1
8
E1
1
12
E2
1
13
K1PA02C00002
K1PQ13D00001 (WJ-FS116)
K1PA06C00003 (WJ-FS109)
POWER BOARD
(Component Side)
E1
5
1
YWFS916E01A
MAIN BOARD (Component Side)
CN717
8
1
CN300
1
8
CN700
1
5
CN302
1
13
CN301
1
12
K1PA12C00001
CN304
1
13
CN303
1
14
ELY322V513 (WJ-FS116)
ELY122V511 (WJ-FS109)
K1PA14C00001
FRONT BOARD (Component Side)
E1
13
1
E2
14
1

BLOCK DIAGRAM OF WJ-FS109

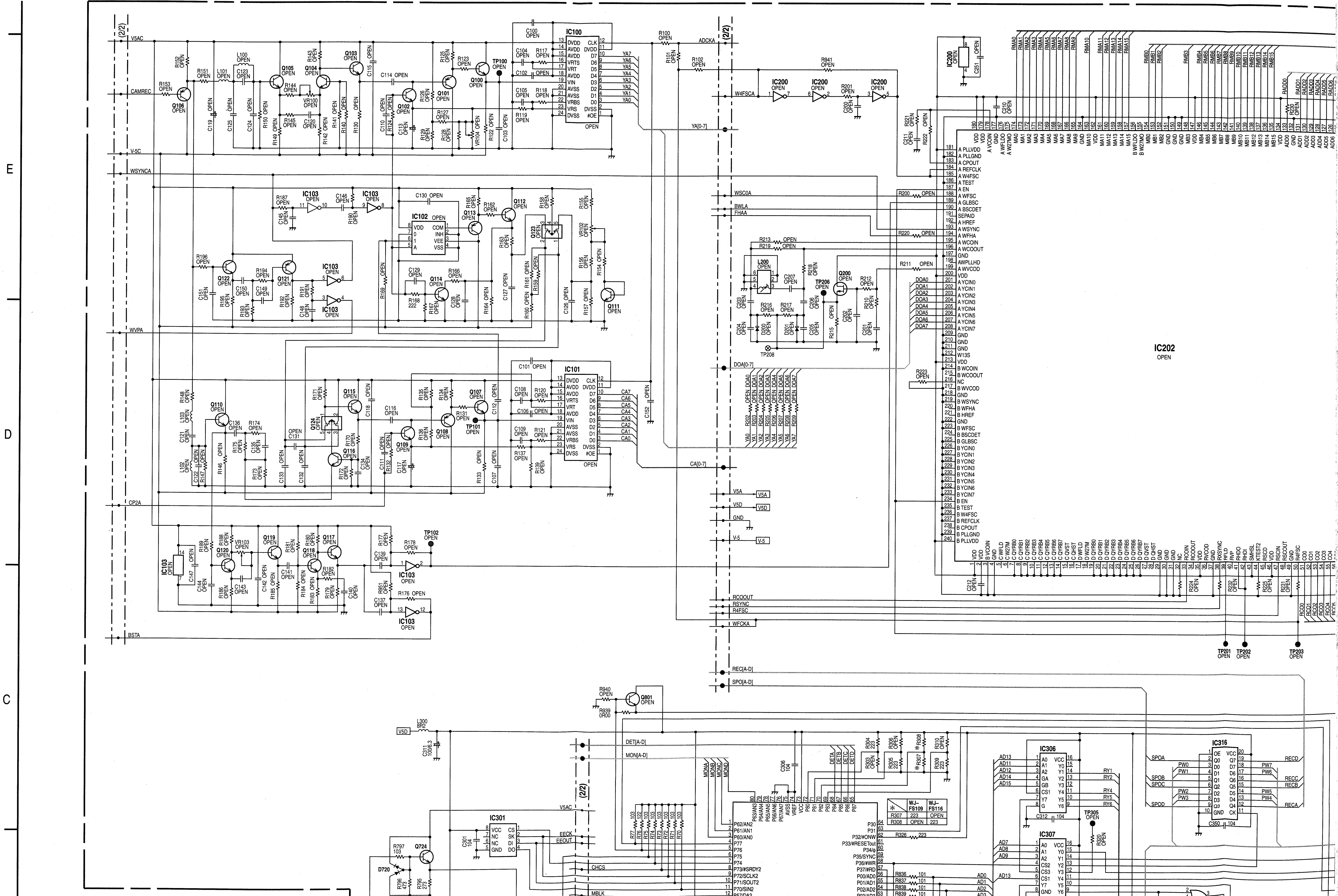

MAIN BOARD
Video Input / Output Connectors
CN701
CN702
CN703
CN704
CN705
CN706
CN707
CN708
CN709
Q707 BUFFER
Q708 BUFFER
Q709 BUFFER
Q710 BUFFER
Q711 BUFFER
Q712 BUFFER
Q713 BUFFER
Q714 BUFFER
Q715 BUFFER
IC701 SELECTOR
IC703 SELECTOR
IC705 SELECTOR
IC710 SELECTOR
IC708,Q704-Q706 CH DETECTOR
CHDET
IC700(a) SELECTOR
IC700(b) SELECTOR
MBLK
RDSYNC
PLAY
Q406 BUFFER
PHNL
Q425 BUFFER
L400,L401, C423-C425, R450,R451 TRAP
Q403-Q405 AMP
VR400 (Y-GAIN)
CLAMP Q402
VR404 (Y-PEDESTAL)
Q400,Q401 BUFFER
IC400 Y. A/D CONVERTER
YB7
IC405
IC802
Q800
IC804 SYNC SEPARATOR
IC805
IC805(f),(e) DELAY
AWPLLHD
RSYNC
IC604
IC605
IC606
WVP
IC603 VIDEO SIGNAL PROCESSOR
IC801 GATE ARRAY LOGIC
IC800 EEPROM
IC502 GATE ARRAY LOGIC
IC503 D-RAM
IC504 D-RAM
TP505 (13.5MHz)
FSC
X500, CT500 (13.5MHz)
VCO
Q501,D502, D503,X501
TP508 (G/L PLL DC)
PLL
IC507,IC508,Q500, Q507,D500,D501, L500 (G/L PLL DC)
4FSC
Q504,R574-R590 D/A CONVERTER
Q505 MIX
Q506 AMP
REC OUT1
DRIVER Q509,Q510
RECOUT
VR501 (ID LEVEL)
IC506
Q508 DRIVER
RDSYNC
R SYNC
IC301 EEPROM
IC302 MICROPROCESSOR
IC712 CHARACTER GENERATOR
Q700-Q703 Q725 DRIVER
Q726-Q728 BUFFER
IC709
IC707 SWITCH
RECOUT1
MONI OUT
SW300
CAMSW
Q724 BUFFER
PBHRL
ALARM
IC309 VOLTAGE DETECTOR
BZ300
Q300 BUFFER
SRESET
CRESET
Q301,Q303 DRIVER
Q305 DRIVER
ALAO
ROUT
IC304 D-RAM
IC308 TRANSCEIVER
IC306 3-8 DECODER
IC307 3-8 DECODER
IC316 LATCH
IC300
IC317
Q307
Q306
IC310 SELECTOR
IC311 SELECTOR
IC312 SELECTOR
IC715 DRIVER
Q302 DRIVER
TP701
TP700
CN700 To Power Board E1
CN303 To Front Board E2
CN302 To D-Sub Board E2
CN301 To D-Sub Board E1
CN304 To Front Board E1
CN300 To D-Sub Board E3
BNC BOARD
CN1
Playback Input Connector
Record Output Connector
Monitor Output Connector
E1 CN717
PLAY IN
GND
REC OUT
GND
MONI OUT
GND
Q723 BUFFER
Q729,Q603 BUFFER
PBSYNC
REC OUT
MONI OUT

BLOCK DIAGRAM OF WJ-FS116

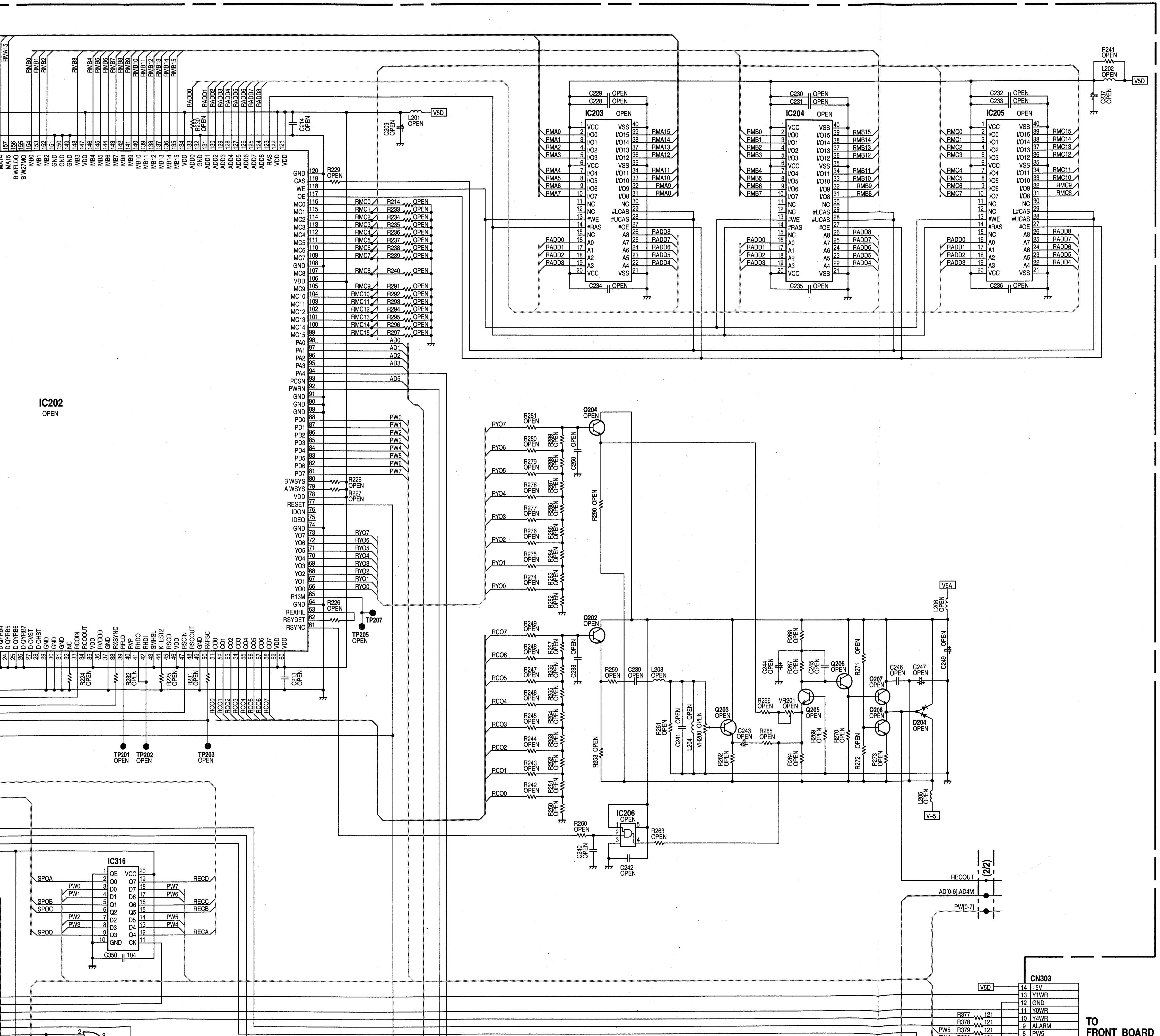

MAIN BOARD
BNC BOARD
Video Input / Output Connectors
CN701
CN702
CN703
CN704
CN705
CN706
CN707
CN708
CN709
CN710
CN126
CN712
CN713
CN714
CN715
CN716
IC701 SELECTOR
IC702 SELECTOR
IC703 SELECTOR
IC704 SELECTOR
IC705 SELECTOR
IC706 SELECTOR
IC700(a) SELECTOR
IC700(b) SELECTOR
IC708,Q704-Q706 CH DETECTOR
IC709
L400,L401, C423-C425, R450,R451 TRAP
Q403-Q405 AMP.
VR400 (Y-GAIN)
VR404 (Y-PEDESTAL)
CLAMP Q402
IC400 Y, A/D CONVERTER
IC804 SYNC SEPARATOR
IC805
IC802
Q800
IC604
IC605
IC606
IC603 VIDEO SIGNAL PROCESSOR
IC801 GATE ARRAY LOGIC
IC800 EEPROM
IC502 GATE ARRAY LOGIC
IC503 D-RAM
IC504 D-RAM
TP505 (13.5MHz)
FSC
X500, CT500 (13.5MHz)
VCO
Q501,D502, D503,X501
TP506 (G/L PLL DC)
PLL
IC507,IC508,Q500, Q507,D500,D501, L500 (G/L PLL DC)
Q504,R574-R590 D/A CONVERTER
Q505 MIX
Q506 AMP.
VR501 (ID LEVEL)
IC506
Q508 DRIVER
DRIVER Q509,Q510
IC301 EEPROM
IC302 MICROPROCESSOR
IC712 CHARACTER GENERATOR
Q700-Q703 Q725 DRIVER
Q726-Q728 BUFFER
IC707 SWITCH
SW300
IC309 VOLTAGE DETECTOR
Q300 BUFFER
BZ300
Q724 BUFFER
Q301,Q303 DRIVER
Q305 DRIVER
IC304 D-RAM
IC308 TRANSCEIVER
IC306 3-8 DECODER
IC307 3-8 DECODER
IC316 LATCH
IC300
IC317
Q306
Q307
IC310 SELECTOR
IC311 SELECTOR
IC312 SELECTOR
IC715 DRIVER
Q302 DRIVER
Q729,Q603 BUFFER
Q723 BUFFER
TP701
TP700
CN700
To Power Board E1
CN303
To Front Board E2
CN302
To D-Sub Board E2
CN301
To D-Sub Board E1
CN304
To Front Board E1
CN300
To D-Sub Board E3
Playback Input Connector
Record Output Connector
Monitor Output Connector
CN1
E1 CN717
PLAY IN
GND
REC OUT
MONI OUT

SCHEMATIC DIAGRAM OF MAIN BOARD (1/2) / D SUB BO

MAIN BOARD (1/2)


E
D
C
(2/2)
V5AC
CAMREC
V-5C
WSYNCA
WVPA
CP2A
BSTA
IC100
IC101
IC102
IC103
IC200
IC202
IC301
IC306
IC307
IC316
ADCKA
W4FSCA
YA[0-7]
WSC0A
BWLA
FHAA
DOA[0-7]
CA[0-7]
V5A
V5D
GND
V-5
RCOOUT
RSYNC
R4FSC
WFCKA
REC[A-D]
SPO[A-D]
DET[A-D]
MON[A-D]
EECK
EECOUT
CHCS
MBLK
TP100
TP101
TP102
TP201
TP202
TP203
TP206
TP208
TP305
Q801
Q724
D720
L300
OPEN

ARD (1/2) / D SUB BOARD


IC202
OPEN
IC203
IC204
IC205
IC206
OPEN
IC316
CN303
TO
FRONT BOARD
V5D
V5A
V-5
Q202
Q203
Q204
Q205
Q206
Q207
Q208
D204
VR201
TP201
TP202
TP203
TP205
TP207
RECOUT
AD[0-6],AD4M
PW[0-7]
(2/2)
C350 104
+5V
Y1WR
GND
Y0WR
Y4WR
ALARM
PW5

< VOLTAGE >
MAIN BOARD (1/2)

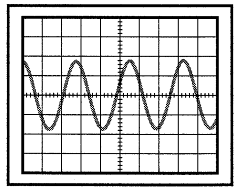
	IC300	IC301	IC304	IC306	IC307	IC308	IC309	IC310	IC311	IC312	IC316	IC317	IC715
Pin 1	5.1	0	–	0.3	4.8	5.1	–	4.9	4.9	4.9	0	5.2	5.2
2	5.1	0	0	0.4	4.8	0.3	1.6	5.2	5.2	5.2	0	0.8	0
3	5.1	0	4.8	0.4	0.3	4.8	–	5.2	5.2	5.2	2.0	0.8	1.3
4	5.1	5.1	4.8	4.8	5.1	–	0	0.5	0.3	0.4	5.1	5.2	0
5	5.1	0	4.8	0.5	5.1	4.8	1.2	5.2	5.2	0	5.2	4.6	1.1
6	5.1	0	0.8	5.1	0.3	–	5.0	5.2	5.2	5.2	0	4.6	0
7	0	–	3.5	5.1	5.1	2.0	5.2	0.4	0.4	0.4	2.0	0	1.8
8	5.1	5.1	2.8	0	0	–	–	0	0	0	2.0	4.8	0
9	4.6		2.7	5.1	5.1	2.0		0.4	0.2	0.4	5.2	4.8	
10	5.1		2.6	5.1	5.1	0		5.2	5.2	0	0	5.2	
11	5.1		0.2	5.1	5.1	–		5.2	5.2	0	5.1	4.8	
12	0.8		–	5.1	5.1	1.9		0.3	0.3	0.4	0	4.8	
13	4.6		–	5.1	5.1	1.9		5.2	5.2	0	2.0	5.2	
14	5.1		0	5.1	5.1	1.9		5.2	5.2	5.2	2.0	5.2	
15			–	5.0	5.1	1.9		5.2	5.2	5.2	0		
16			–	5.1	5.1	1.9		5.2	5.2	5.2	0		
17			–			1.9					4.9		
18			–			1.9					4.9		
19			0.2			5.1					0		
20			5.1			5.1					5.2		
21			0.4										
22			2.9										
23			0										
24			0.3										
25			4.8										
26			4.4										
27			5.1										
28			4.5										

	B	C	E
Q300	0	3.5	0
301	4.7	0.5	5.1
302	0.6	0	0
303	0.5	0	0
724	0	3.5	0

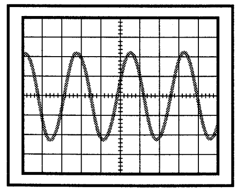
	1	2	3	4	5	6
Q305	0	0	0	5.2	0.6	0
306	0	0	0	0	0	0
307	0	5.1	4.5	5.1	0	0

< WAVEFORM >
MAIN BOARD (1/2)

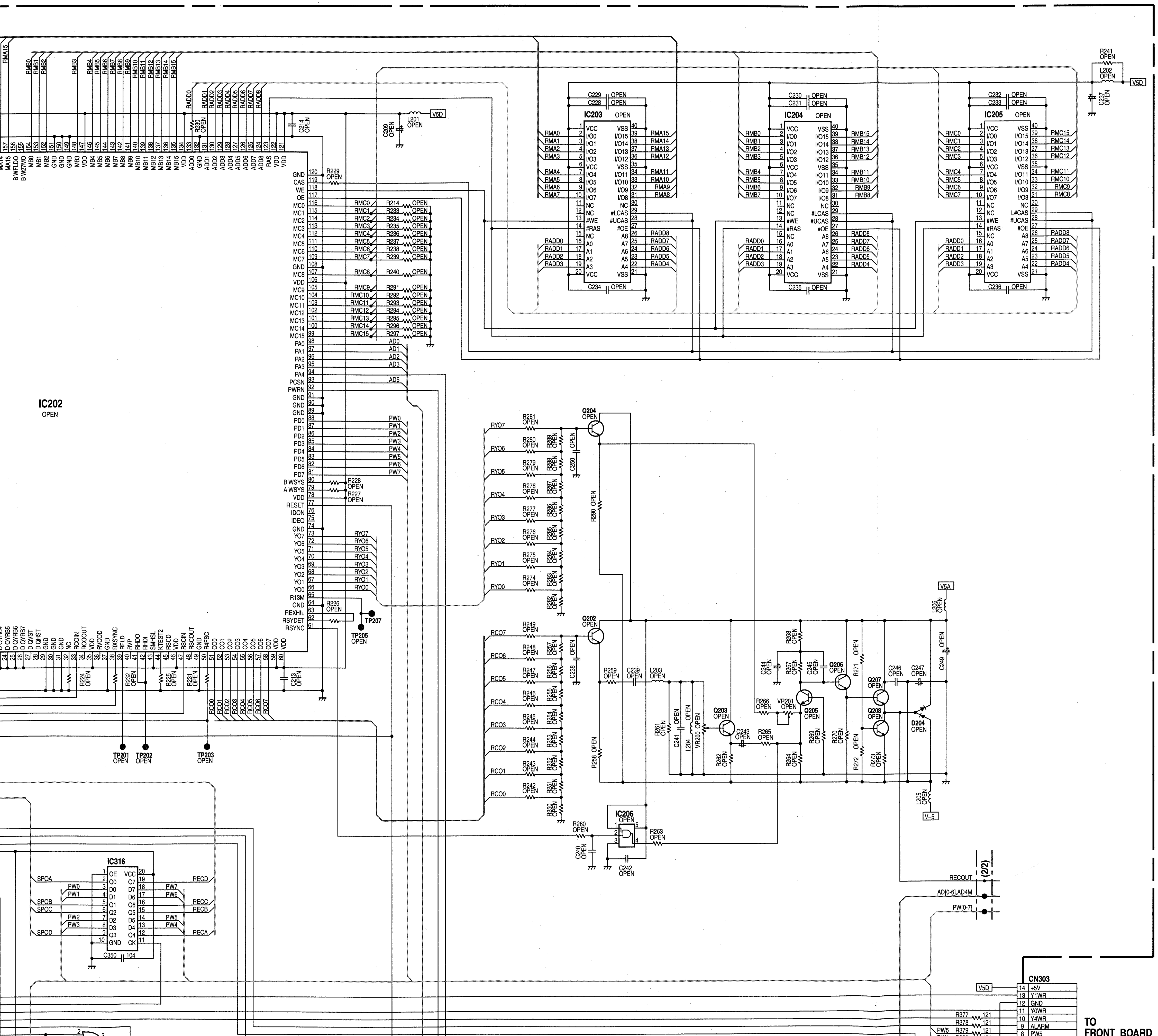
1. 50 ns/DIV, 1 V/DIV



2. 50 ns/DIV, 1 V/DIV



ARD (1/2) / D SUB BOARD


IC202
OPEN
IC203
IC204
IC205
OPEN
IC206
OPEN
IC316
Q202
Q203
Q204
Q205
Q206
Q207
Q208
D204
TP201
TP202
TP203
TP205
TP207
V5D
V5A
V–5
RECOUT
AD[0-6],AD4M
PW[0-7]
(2/2)
CN303
14 +5V
13 Y1WR
12 GND
11 Y0WR
10 Y4WR
9 ALARM
8 PW5
TO
FRONT BOARD

< VOLTAGE >
MAIN BOARD (1/2)

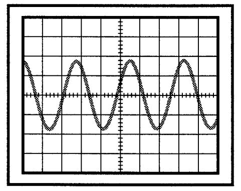
	IC300	IC301	IC304	IC306	IC307	IC308	IC309	IC310	IC311	IC312	IC316	IC317	IC715
Pin 1	5.1	0	–	0.3	4.8	5.1	–	4.9	4.9	4.9	0	5.2	5.2
2	5.1	0	0	0.4	4.8	0.3	1.6	5.2	5.2	5.2	0	0.8	0
3	5.1	0	4.8	0.4	0.3	4.8	–	5.2	5.2	5.2	2.0	0.8	1.3
4	5.1	5.1	4.8	4.8	5.1	–	0	0.5	0.3	0.4	5.1	5.2	0
5	5.1	0	4.8	0.5	5.1	4.8	1.2	5.2	5.2	0	5.2	4.6	1.1
6	5.1	0	0.8	5.1	0.3	–	5.0	5.2	5.2	5.2	0	4.6	0
7	0	–	3.5	5.1	5.1	2.0	5.2	0.4	0.4	0.4	2.0	0	1.8
8	5.1	5.1	2.8	0	0	–	–	0	0	0	2.0	4.8	0
9	4.6		2.7	5.1	5.1	2.0		0.4	0.2	0.4	5.2	4.8	
10	5.1		2.6	5.1	5.1	0		5.2	5.2	0	0	5.2	
11	5.1		0.2	5.1	5.1	–		5.2	5.2	0	5.1	4.8	
12	0.8		–	5.1	5.1	1.9		0.3	0.3	0.4	0	4.8	
13	4.6		–	5.1	5.1	1.9		5.2	5.2	0	2.0	5.2	
14	5.1		0	5.1	5.1	1.9		5.2	5.2	5.2	2.0	5.2	
15			–	5.0	5.1	1.9		5.2	5.2	5.2	0		
16			–	5.1	5.1	1.9		5.2	5.2	5.2	0		
17			–			1.9					4.9		
18			–			1.9					4.9		
19			0.2			5.1					0		
20			5.1			5.1					5.2		
21			0.4										
22			2.9										
23			0										
24			0.3										
25			4.8										
26			4.4										
27			5.1										
28			4.5										

	B	C	E
Q300	0	3.5	0
301	4.7	0.5	5.1
302	0.6	0	0
303	0.5	0	0
724	0	3.5	0

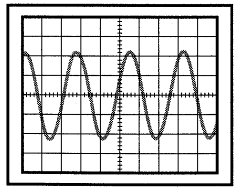
	1	2	3	4	5	6
Q305	0	0	0	5.2	0.6	0
306	0	0	0	0	0	0
307	0	5.1	4.5	5.1	0	0

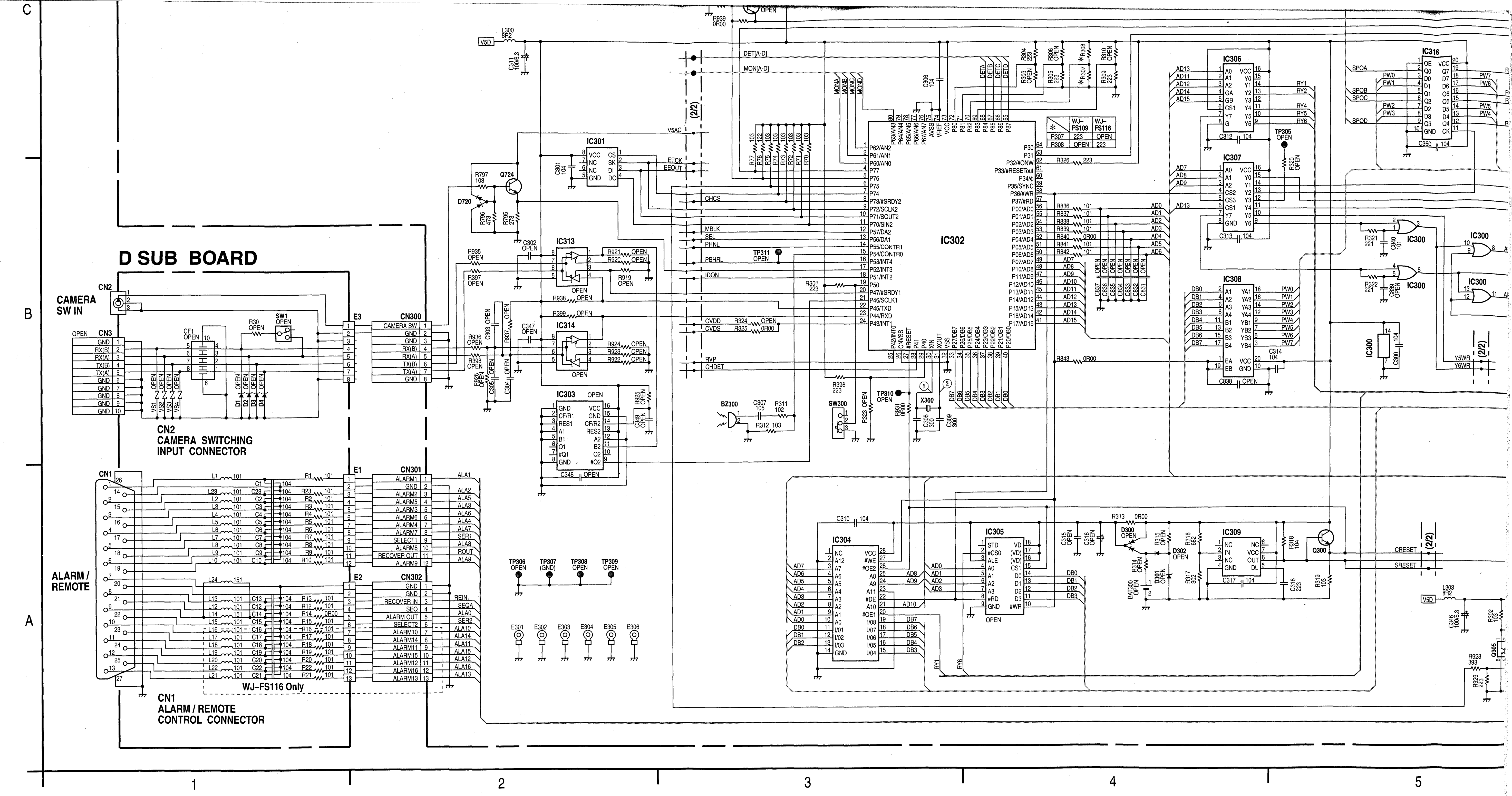
< WAVEFORM >
MAIN BOARD (1/2)

1. 50 ns/DIV, 1 V/DIV

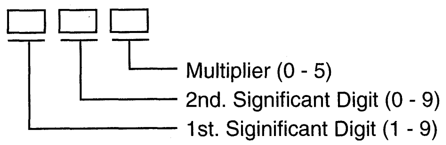


2. 50 ns/DIV, 1 V/DIV




D SUB BOARD
CAMERA SW IN
CN2
CN3
CF1
SW1
CN300
E3
CN2
CAMERA SWITCHING
INPUT CONNECTOR
CN1
ALARM / REMOTE
CN301
E1
CN302
E2
WJ–FS116 Only
CN1
ALARM / REMOTE
CONTROL CONNECTOR
IC301
IC302
IC303
IC304
IC305
IC306
IC307
IC308
IC309
IC313
IC314
IC316
IC300
Q724
D720
Q300
BZ300
SW300
X300
BAT300
TP305
TP306
TP307
TP308
TP309
TP310
TP311
E301
E302
E303
E304
E305
E306
V5D
V5AC
CRESET
SRESET
Y5WR
Y6WR
A
B
C
1
2
3
4
5

Note: The value indicated in the schematic diagram should be read as follows:


Multiplier (0 - 5)
2nd. Significant Digit (0 - 9)
1st. Siginificant Digit (1 - 9)

<Example>

For Resistor:

330 ➡ $33 \times 10^0 = 33\ \Omega$

561 ➡ $56 \times 10^1 = 560\ \Omega$

123 ➡ $12 \times 10^3 = 12\text{k}\ \Omega$

0R00 = $0\ \Omega$

For Capacitor:

820 ➡ $82 \times 10^0 = 82\ \text{pF}$

102 ➡ $10 \times 10^2 = 1000\ \text{pF} = 0.001\ \mu\text{F}$

104 ➡ $10 \times 10^4 = 100000\ \text{pF} = 0.1\ \mu\text{F}$

The suffix attached to capacitance indicates a type of capacitor.

For Coil:

010 ➡ $1 \times 10^0 = 1\ \mu\text{H}$

8R2 ➡ $8.2 \times 10^0 = 8.2\ \mu\text{H}$

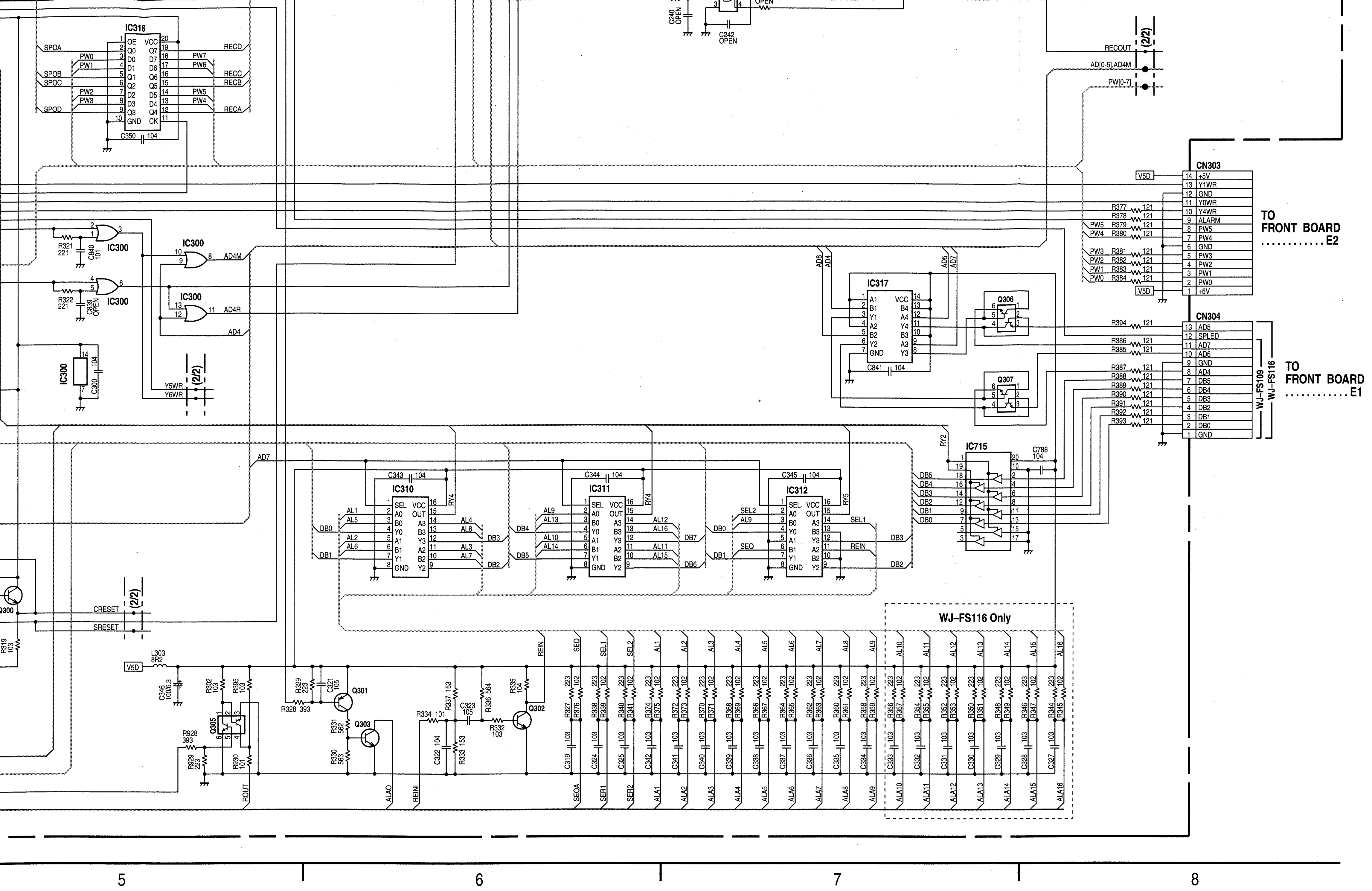
101 ➡ $10 \times 10^1 = 100\ \mu\text{H}$

< INDEX >
MAIN BOARD (1/2)

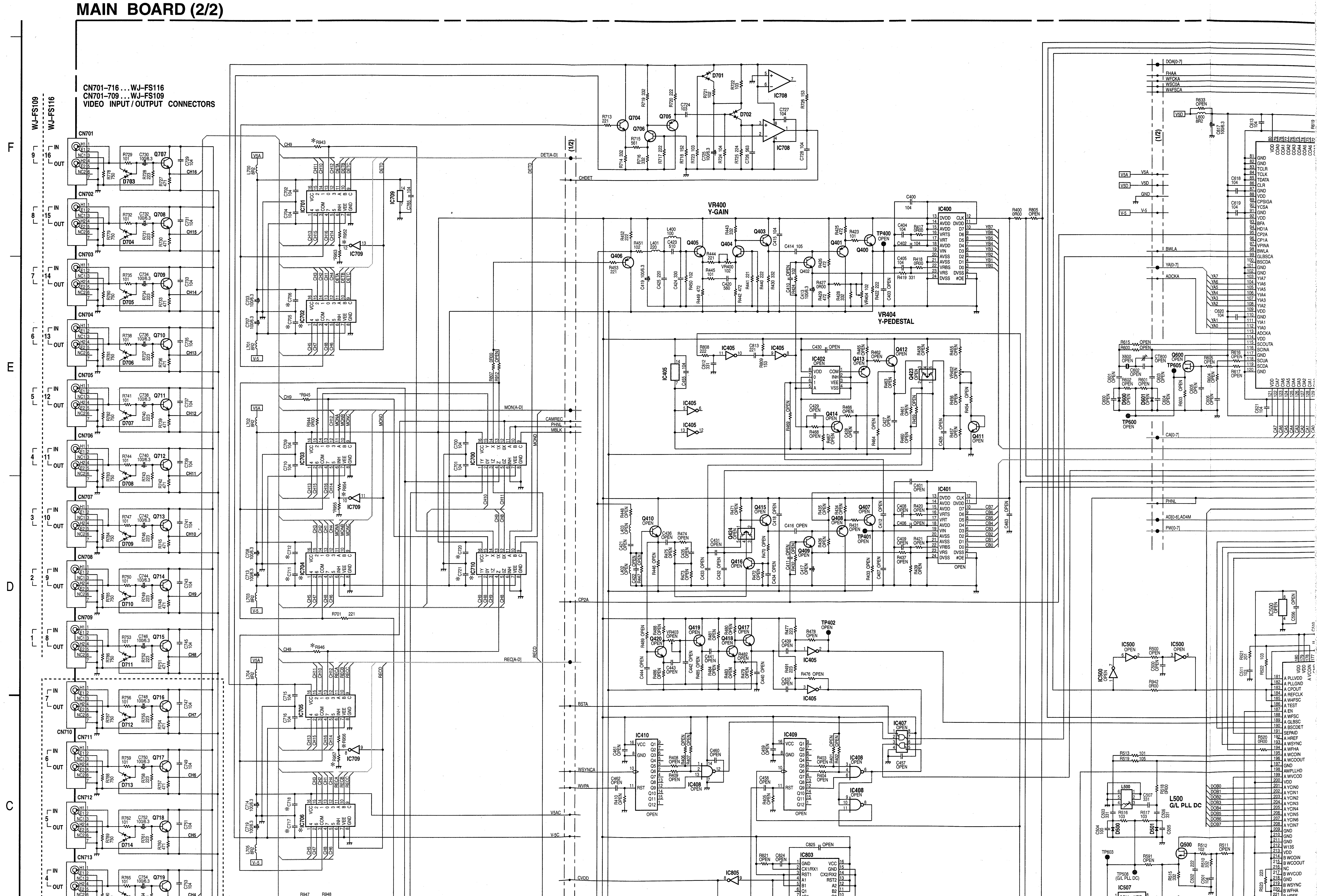
IC300	B5	Q300	A5
IC301	B2	Q301	A6
IC302	B3	Q302	A6
IC304	A3	Q303	A6
IC306	C4	Q305	A5
IC307	B4	Q306	B7
IC308	B4	Q307	B7
IC309	A4	Q724	B2
IC310	A6		
IC311	A6	D720	B2
IC312	A7		
IC316	C5		
IC317	B7		
IC715	B7		

< INDEX >
D SUB BOARD

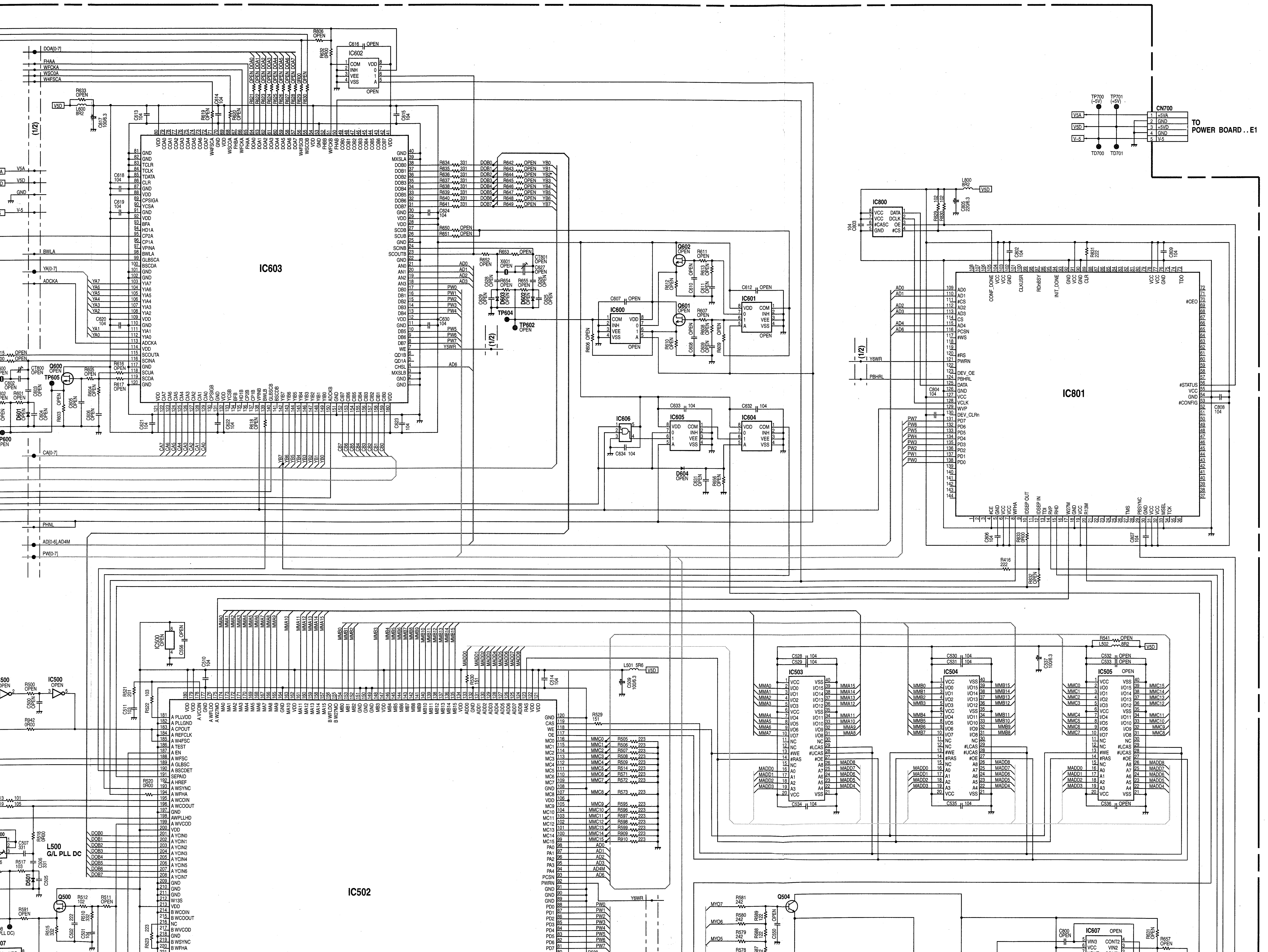
D1	B1
D2	B1
D3	B1
D4	B1


IC316
IC300
IC317
IC310
IC311
IC312
IC715
Q300
Q301
Q302
Q303
Q305
Q306
Q307
CN303
CN304
TO
FRONT BOARD
............E2
TO
FRONT BOARD
............E1
WJ-FS109
WJ-FS116
WJ-FS116 Only
(2/2)
RECOUT
AD[0-6],AD4M
PW[0-7]
V5D
CRESET
SRESET
Y5WR
Y6WR
AD4M
AD4R
AD4
AD7
ROUT
ALAO
REINI
SEQA
SER1
SEP2
L303
8R2
5
6
7
8

SCHEMATIC DIAGRAM OF MAIN BOARD (2/2)


MAIN BOARD (2/2)
CN701-716 . . . WJ-FS116
CN701-709 . . . WJ-FS109
VIDEO INPUT / OUTPUT CONNECTORS
WJ-FS109
WJ-FS116
F
E
D
C
CN701
CN702
CN703
CN704
CN705
CN706
CN707
CN708
CN709
CN710
CN711
CN712
CN713
IN
OUT
Q707
Q708
Q709
Q710
Q711
Q712
Q713
Q714
Q715
Q716
Q717
Q718
Q719
D703
D704
D705
D706
D707
D708
D709
D710
D711
D712
D713
D714
CH16
CH15
CH14
CH13
CH12
CH11
CH10
CH9
CH8
CH7
CH6
CH5
CH4
IC701
IC702
IC703
IC704
IC705
IC706
IC709
IC700
IC710
DET[A-D]
CHDET
MON[A-D]
CAMREC
PHNL
MBLK
REC[A-D]
CP2A
BSTA
WSYNCA
WVPA
V5AC
V-5C
CVDD
(1/2)
Q704
Q705
Q706
D701
D702
IC708
VR400
Y-GAIN
VR404
Y-PEDESTAL
IC400
IC401
IC402
IC405
IC408
IC409
IC410
IC407
IC803
IC805
Q400
Q401
Q402
Q403
Q404
Q405
Q406
Q407
Q408
Q409
Q410
Q411
Q412
Q413
Q414
Q415
Q416
Q417
Q418
Q419
Q420
Q423
Q424
TP400
TP401
TP402
DOA[0-7]
FHAA
WFCKA
WSC0A
W4FSCA
BWLA
YA[0-7]
ADCKA
CA[0-7]
PHNL
AD[0-6],AD4M
PW[0-7]
Q600
TP600
TP605
D500
D501
D601
IC500
IC507
L500
G/L PLL DC
Q500
TP508
(G/L PLL DC)
TP603
DOB0
DOB1
DOB2
DOB3
DOB4
DOB5
DOB6
DOB7

MAIN BOARD (2/2) / BNC BOARD



IC603
IC602
IC600
IC601
IC604
IC605
IC606
IC800
IC801
IC502
IC503
IC504
IC505
IC607
IC500
CN700
TO POWER BOARD . . E1
L500 G/L PLL DC
(1/2)

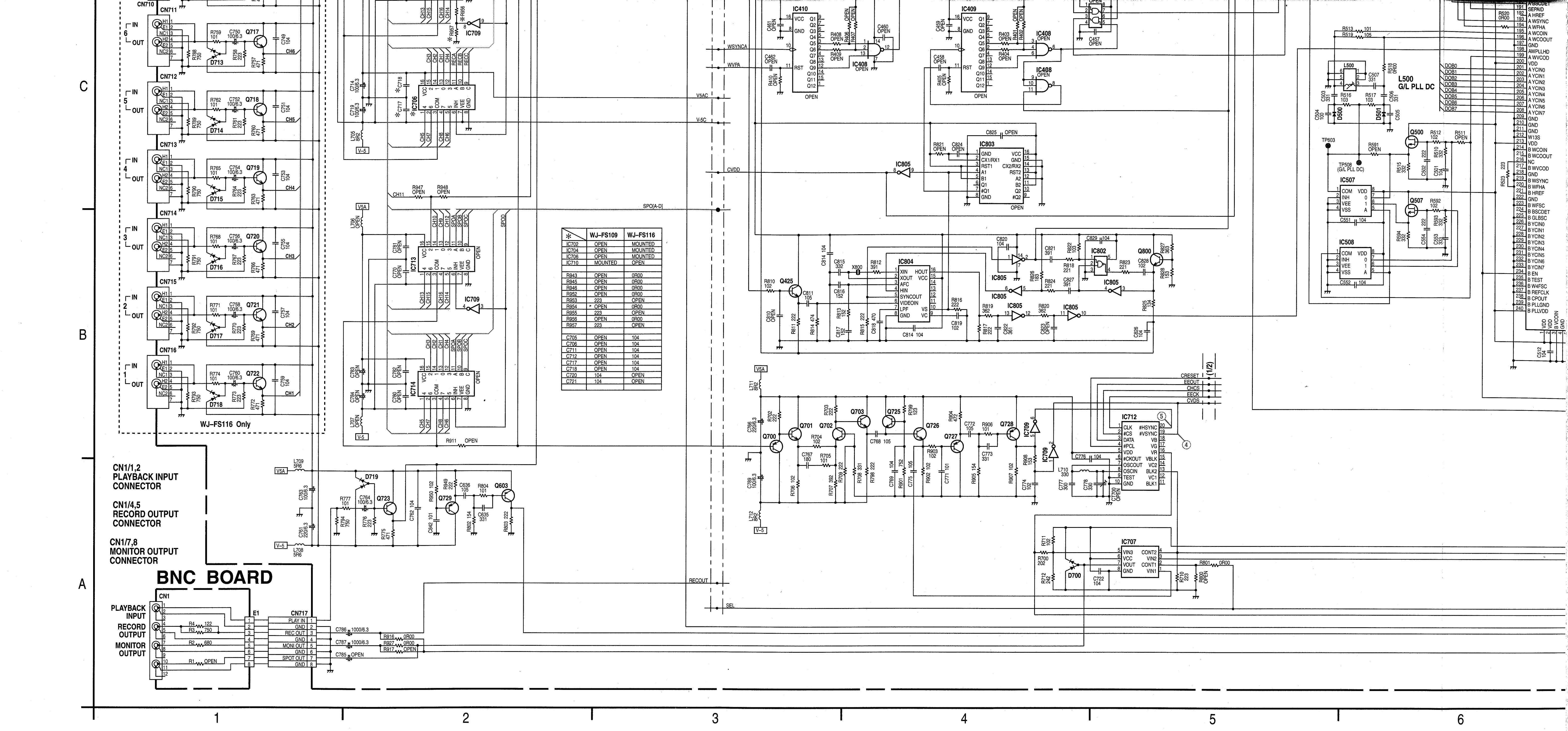
< VOLTAGE >
MAIN BOARD (2/2)

	IC400	IC405	IC506	IC507	IC508	IC604	IC605
Pin 1	0	5.1	5.1	0.7	0	0	0
2	0	0	0	0	0	0	0
3	5.1	5.1	0	0	0	0	0
4	5.1	0	0	0	0	0	0
5	5.1	0	5.1	0.3	0.3	0	–
6	5.1	5.1		0.6	0.3	0	0
7	5.1	0		0.7	0.3	0	0
8	5.1	0		5.1	5.1	5.0	5.0
9	5.1	5.1					
10	5.1	5.1					
11	5.1	0					
12	2.4	5.1					
13	5.1	0					
14	5.1	5.1					
15	5.1						
16	2.8						
17	2.8						
18	5.1						
19	4.3						
20	0						
21	0						
22	0.7						
23	0.7						
24	0						

	IC606	IC700	IC701	IC702	IC703	IC704	IC705
Pin 1	0	–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
2	0	–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
3	0	–0.7	–2.0	–2.0	–2.0	–2.0	–2.0
4	0	–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
5	5.0	–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
6		0	5.2	–	5.2	–	5.2
7		–5.2	–5.2	–5.2	–5.2	–5.2	–5.2
8		0	0	0	0	0	0
9		–	–	–	–	–	–
10		–	–	–	–	–	–
11		–	–	–	–	–	–
12		–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
13		–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
14		–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
15		–2.0	–2.0	–2.0	–2.0	–2.0	–2.0
16		5.1	5.2	5.2	5.2	5.2	5.2

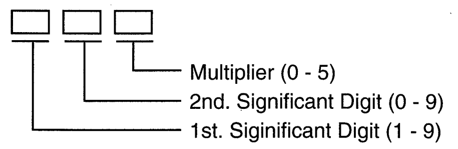
	IC706	IC707	IC708	IC709	IC710	IC712	IC802
Pin 1	–2.0	3.1	0	0.4	–2.0	3.5	5.1
2	–2.0	0	2.0	4.5	–2.0	3.5	5.1
3	–2.0	2.2	1.7	0	–2.0	3.5	0
4	–2.0	0	0	5.2	–2.0	0	0
5	–2.0	2.7	0	0.4	–2.0	5.1	5.1
6	–	5.1	0	4.7	0	–	
7	–5.2	2.3	0	0	–5.2	0	
8	0	0	2.3	5.2	0	0	
9	–		2.0	3.0	0	–	
10	–		5.2	–	0	0	
11	–		2.5	–	0	0	
12	–2.0		5.2	–2.0	0	0	
13	–2.0		–	–2.0	0	0	
14	–2.0		5.2	–2.0	0	1.8	
15	–2.0			–2.0	0	0	
16	5.2			5.1	0.3	1.3	
17					0	0	
18					0	0.3	
19					4.5	5.1	
20					4.7	5.2	

	IC804	IC805
Pin 1	2.7	4.3
2	2.2	0
3	2.4	0.9
4	0	5.1
5	0.5	5.1
6	2.6	0
7	2.0	0
8	0	0
9	4.9	4.3
10	4.3	0.3
11	0	4.8
12	5.1	4.8
13	0	0.3
14	4.4	5.1
15	5.1	
16	0.3	


CN710
CN711
CN712
CN713
CN714
CN715
CN716
IN 6 OUT
IN 5 OUT
IN 4 OUT
IN 3 OUT
IN 2 OUT
IN 1 OUT
WJ-FS116 Only
CN1/1,2 PLAYBACK INPUT CONNECTOR
CN1/4,5 RECORD OUTPUT CONNECTOR
CN1/7,8 MONITOR OUTPUT CONNECTOR
BNC BOARD
CN1
PLAYBACK INPUT
RECORD OUTPUT
MONITOR OUTPUT
E1
CN717
PLAY IN
GND
REC OUT
GND
MONI OUT
GND
SPOT OUT
GND
IC706
IC713
IC714
IC709
IC410
IC409
IC408
IC803
IC804
IC802
IC805
IC712
IC707
IC507
IC508
L500 G/L PLL DC
WSYNCA
WVPA
V5AC
V-5C
CVDD
SPO[A-D]
RECOUT
SEL
CRESET
EEOUT
CHCS
EECK
CVDS
(1/2)
A
B
C
1
2
3
4
5
6

*	WJ-FS109	WJ-FS116
IC702	OPEN	MOUNTED
IC704	OPEN	MOUNTED
IC706	OPEN	MOUNTED
IC710	MOUNTED	OPEN
R943	OPEN	0R00
R945	OPEN	0R00
R946	OPEN	0R00
R952	OPEN	0R00
R953	223	OPEN
R954	OPEN	0R00
R955	223	OPEN
R956	OPEN	0R00
R957	223	OPEN
C705	OPEN	104
C706	OPEN	104
C711	OPEN	104
C712	OPEN	104
C717	OPEN	104
C718	OPEN	104
C720	104	OPEN
C721	104	OPEN

Note: The value indicated in the schematic diagram should be read as follows:


Multiplier (0 - 5)
2nd. Significant Digit (0 - 9)
1st. Siginificant Digit (1 - 9)

<Example>

For Resistor:

330 ➡ 33 x 10^0 = 33 Ω
561 ➡ 56 x 10^1 = 560 Ω
123 ➡ 12 x 10^3 = 12k Ω
0R00 = 0 Ω

For Capacitor:

820 ➡ 82 x 10^0 = 82 pF
102 ➡ 10 x 10^2 = 1000 pF = 0.001 μF
104 ➡ 10 x 10^4 = 100000 pF = 0.1 μF

The suffix attached to capacitance indicates a type of capacitor.

For Coil:

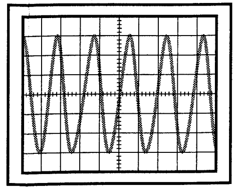
010 ➡ 1 x 10^0 = 1 μH
8R2 ➡ 8.2 x 10^0 = 8.2 μH
101 ➡ 10 x 10^1 = 100 μH

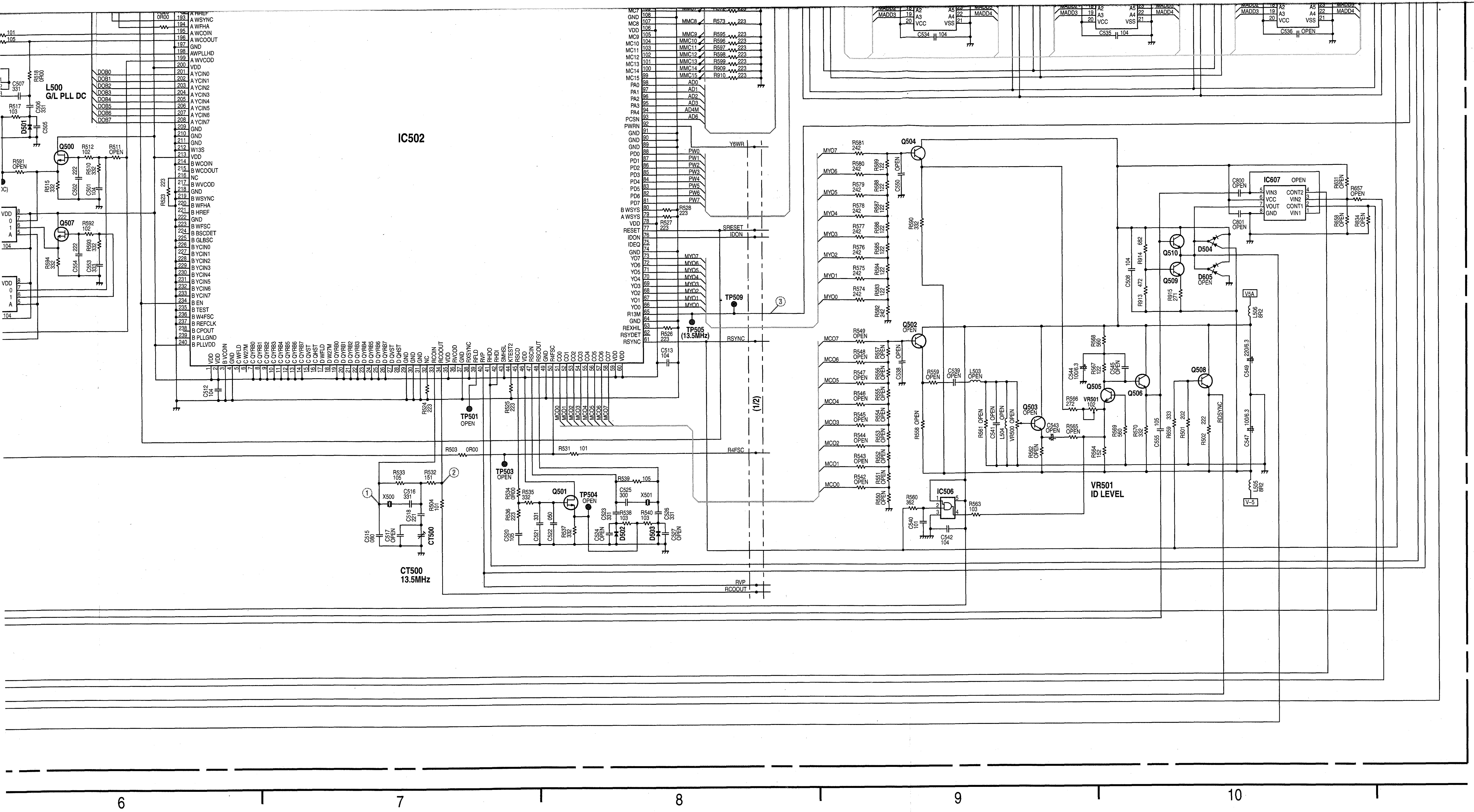
< INDEX >
MAIN BOARD (2/2)

IC400	F5	
IC405	D4,E3,E4	
IC502	C7	
IC503	D9	
IC504	D10	
IC506	B9	
IC507	C6	
IC508	B6	
IC603	E7	
IC604	E9	
IC605	E8	
IC606	E8	
IC700	E3	
IC701	F2	
IC702	E2	WJ-FS116 only
IC703	E2	
IC704	D2	WJ-FS116 only
IC705	C2	
IC706	C2	WJ-FS116 only
IC707	A5	
IC708	F4	
IC709	B2,B4,C2,D2,F2	
IC710	D3	WJ-FS109 only
IC712	B5	
IC800	F9	
IC801	E10	
IC802	B5	
IC804	B4	
IC805	B4,B5,C4	
Q400	F4	
Q401	F4	
Q402	E4	
Q403	F4	
Q404	F4	
Q405	F4	
Q406	E3	
Q425	B3	
Q500	C6	
Q501	B8	
Q504	C9	
Q505	B10	
Q506	B10	
Q507	C6	
Q508	B10	
Q509	B10	
Q510	B10	
Q603	A2	
Q700	B3	
Q701	B3	
Q702	B3	
Q703	B4	
Q704	F3	
Q705	F3	
Q706	F3	
Q707	F1	
Q708	F1	
Q709	E1	
Q710	E1	
Q711	E1	
Q712	E1	
Q713	D1	
Q714	D1	
Q715	D1	
Q716	C1	
Q717	C1	
Q718	C1	
Q719	C1	
Q720	B1	
Q721	B1	
Q722	B1	
Q723	A2	
Q725	B4	
Q726	B4	
Q727	B4	
Q728	B4	
Q729	A2	
Q800	B5	
D500	C5	
D501	C6	
D502	A8	
D503	A8	
D504	B10	
D700	A4	
D701	F4	
D702	F4	
D703	F1	
D704	F1	
D705	E1	
D706	E1	
D707	E1	
D708	E1	
D709	D1	
D710	D1	
D711	D1	
D712	C1	
D713	C1	
D714	C1	
D715	C1	
D716	B1	
D717	B1	
D718	B1	
D719	A2	

< WAVEFORM >
MAIN BOARD (2/2)

1. 20 ns/DIV, 500 mV/DIV




IC502
L500
G/L PLL DC
Q500
Q507
D501
Q504
Q502
Q503
Q505
Q506
Q508
Q509
Q510
D504
D605
IC506
IC607
TP501
TP503
TP504
TP505
(13.5MHz)
TP509
X500
X501
Q501
D502
D503
CT500
13.5MHz
VR501
ID LEVEL
R4FSC
RSYNC
RVP
RCOOUT
SRESET
IDON
Y6WR
(1/2)
V5A
V-5
6
7
8
9
10

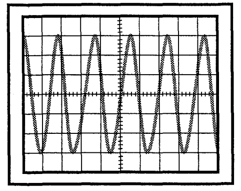
3	2.4	0.9
4	0	5.1
5	0.5	5.1
6	2.6	0
7	2.0	0
8	0	0
9	4.9	4.3
10	4.3	0.3
11	0	4.8
12	5.1	4.8
13	0	0.3
14	4.4	5.1
15	5.1	
16	0.3	

	IC503	IC504
1	5.1	5.1
2	4.9	5.0
3	4.9	5.0
4	4.9	5.0
5	4.9	5.0
6	5.1	5.1
7	0	0
8	4.9	5.0
9	4.9	5.0
10	4.9	5.0
11	–	–
12	–	–
13	4.8	4.8
14	1.0	1.0
15	–	–
16	0.8	0.8
17	0.8	0.8
18	1.0	1.0
19	0.8	0.8
20	5.1	5.0
21	0	0
22	0	1.0
23	1.6	1.6
24	1.0	0.9
25	0.4	0.2
26	0.6	1.4
27	3.4	3.4
28	3.0	3.0
29	3.0	3.0
30	–	–
31	5.0	5.0
32	5.0	5.0
33	5.0	5.0
34	5.0	5.0
35	0	0
36	0	2.5
37	5.0	5.0
38	5.0	5.0
39	5.0	0
40	0	0

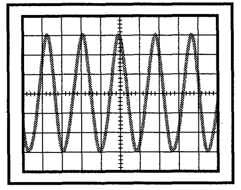
	B	C	E
Q401	4.1	5.2	5.0
402	0	4.1	0.9
403	1.2	5.1	5.8
404	–0.5	1.2	–1.1
405	–0.7	5.1	–1.3
406	–2.0	-5.2	–1.3
425	–1.3	5.1	–2.0
500	(G) 0.2	(D) 5.1	(S) 0.8
501	(G) 0.4	(D) 5.1	(S) 0.8
504	0	5.1	0.6
505	0	1.4	-0.7
506	1.4	5.1	0.8
507	(G) –	(D) 5.1	(S) 0.7
508	0	5.1	0.7
509	–1.2	0.1	–1.8
510	0.8	5.1	0.1
603	4.4	5.0	5.1
700	–2.0	-5.2	–1.4
701	–1.4	5.2	–2.0
702	–0.7	1.4	–1.3
703	1.4	5.2	0.8
704	–2.0	3.5	–2.6
705	1.5	-5.2	2.0
707	–1.2	5.1	-2.0
708	–1.3	5.1	–2.0
709	–1.2	5.1	–2.0
710	–1.3	5.1	–2.0
711	–1.2	5.1	–2.0
712	–1.3	5.1	–2.0
713	–1.2	5.1	–2.0
714	–1.3	5.1	–2.0
715	–1.2	5.1	–2.0
716	–1.3	5.1	–2.0
717	–1.2	5.1	–2.0
718	–1.3	5.1	–2.0
719	–1.2	5.1	–2.0
720	–1.3	5.1	–2.0
721	–1.2	5.1	–2.0
722	–1.3	5.1	–2.0
720	0	0	3.5
723	–1.3	5.1	–2.0
725	2.0	5.2	2.5
726	2.5	5.2	2.0
727	1.9	0	2.5
728	5.5	0.4	5.2
800	1.5	5.1	0.9

< WAVEFORM >
MAIN BOARD (2/2)

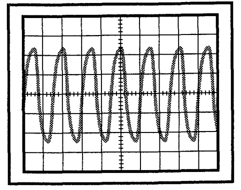
1. 20 ns/DIV, 500 mV/DIV



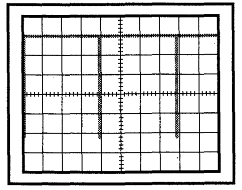
2. 20 ns/DIV, 500 mV/DIV



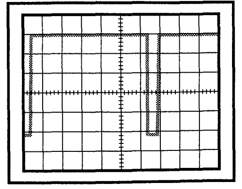
3. 50 ns/DIV, 1 V/DIV



4. 5 ms/DIV, 1 V/DIV

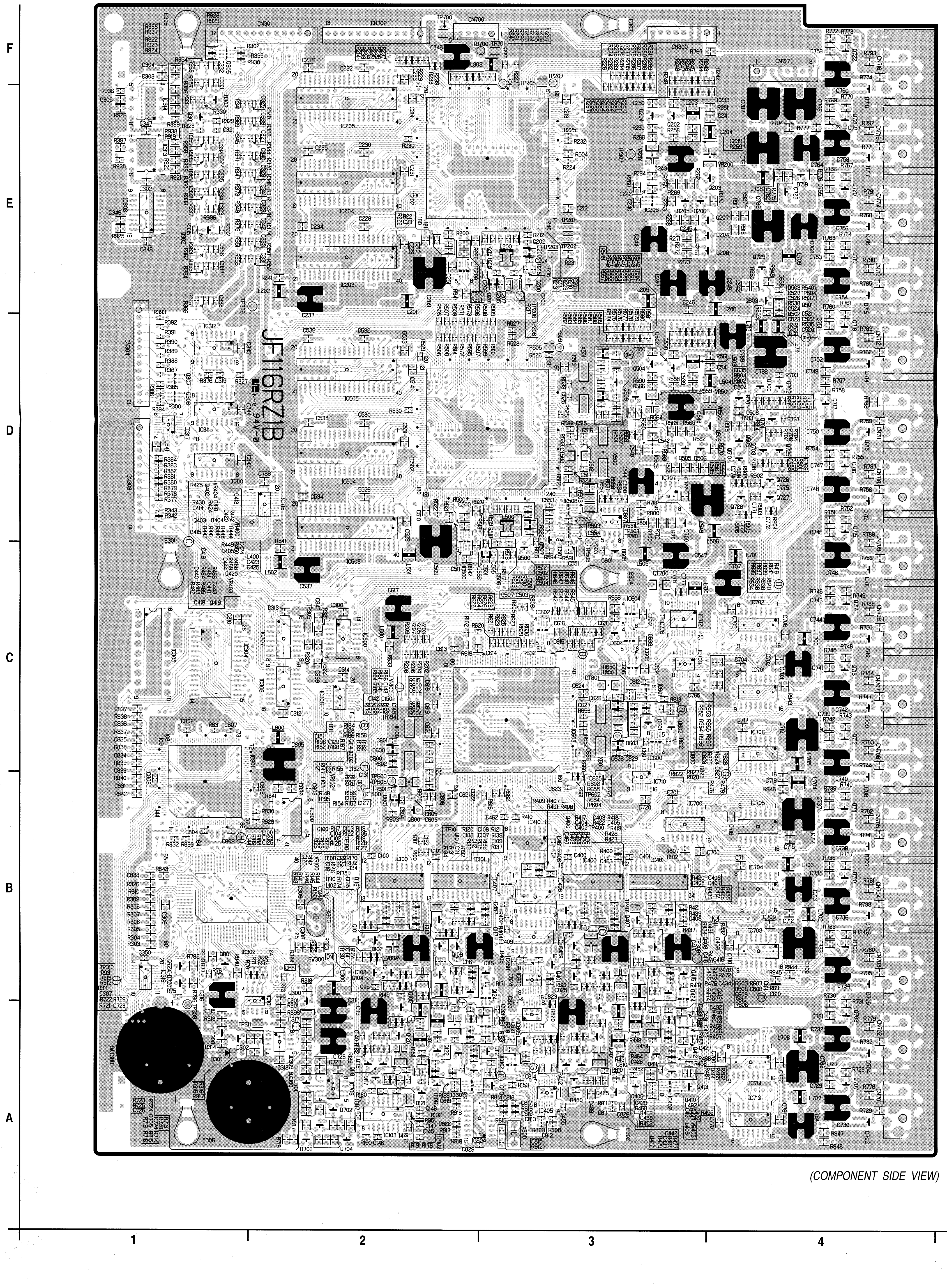


5. 10 µs/DIV, 1 V/DIV



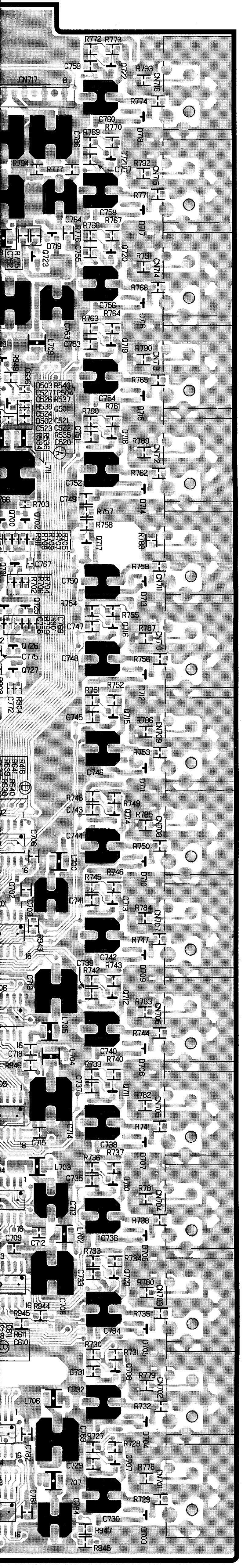
CONDUCTOR VIEW OF MAIN BOARD / D SUB

MAIN BOARD


F
E
D
C
B
A
1
2
3
4
JF116RZ1B
94V-0

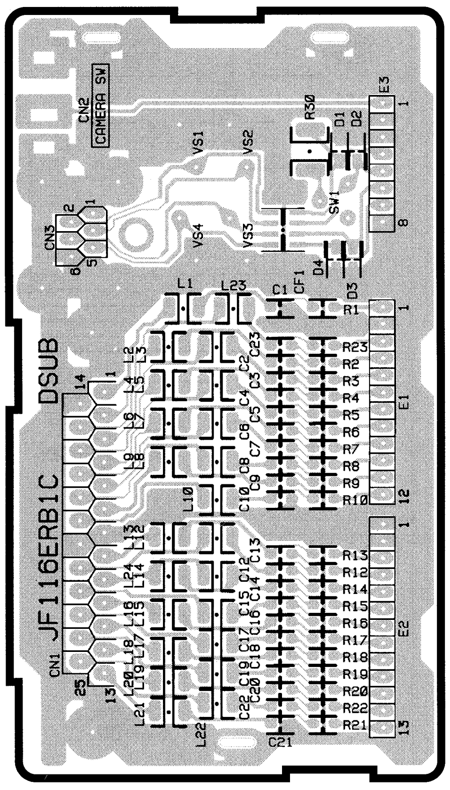
(COMPONENT SIDE VIEW)

AIN BOARD / D SUB BOARD / BNC BOARD

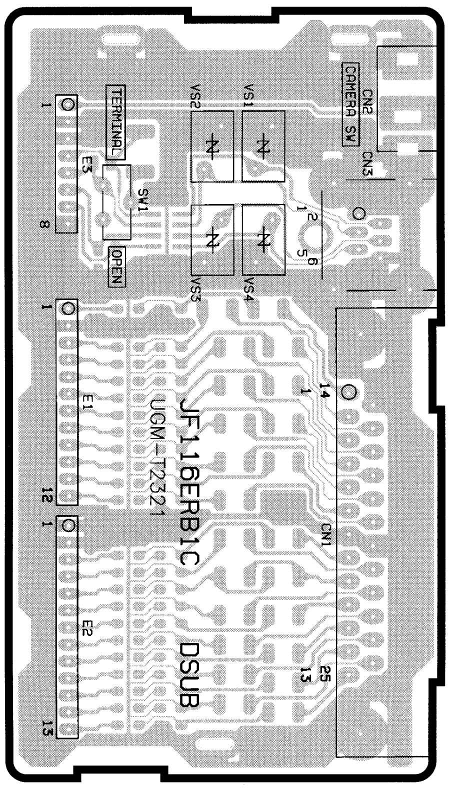

CN717
CN701
CN702
CN703
CN704
CN705
CN706
CN707
CN708
CN709
CN710
CN711
CN712
CN713
CN714
CN715
CN716

(COMPONENT SIDE VIEW)

D SUB BOARD

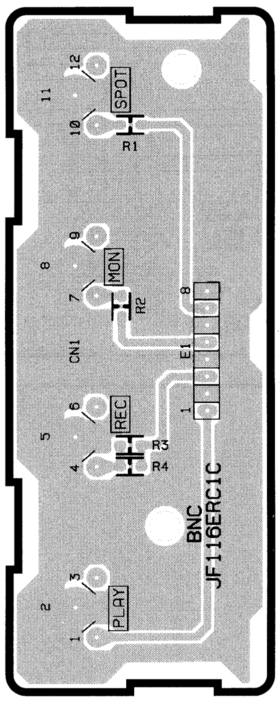

JF116ERB1C
DSUB
CN1
CN2
CAMERA SW
CN3
VS1
VS2
VS3
VS4
SW1
R30
D1
D2
D3
D4
CF1
E1
E2
E3

(PATTERN SIDE VIEW)

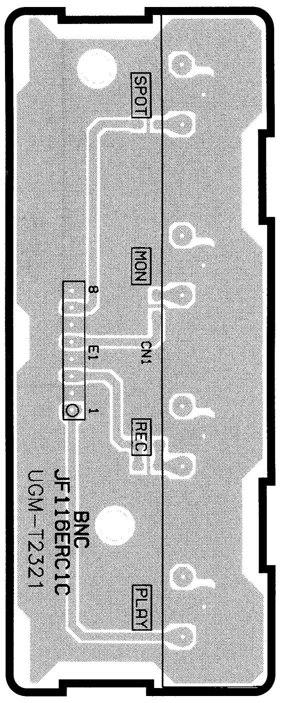

JF116ERB1C
UGM-T2321
DSUB
CN1
CN2
CAMERA SW
CN3
TERMINAL
OPEN
SW1
VS1
VS2
VS3
VS4
E1
E2
E3

(COMPONENT SIDE VIEW)

BNC BOARD


BNC
JF116ERC1C
CN1
E1
PLAY
REC
MON
SPOT
R1
R2
R3
R4

(PATTERN SIDE VIEW)


BNC
JF116ERC1C
UGM-T2321
CN1
E1
PLAY
REC
MON
SPOT

(COMPONENT SIDE VIEW)

< INDEX >
MAIN BOARD

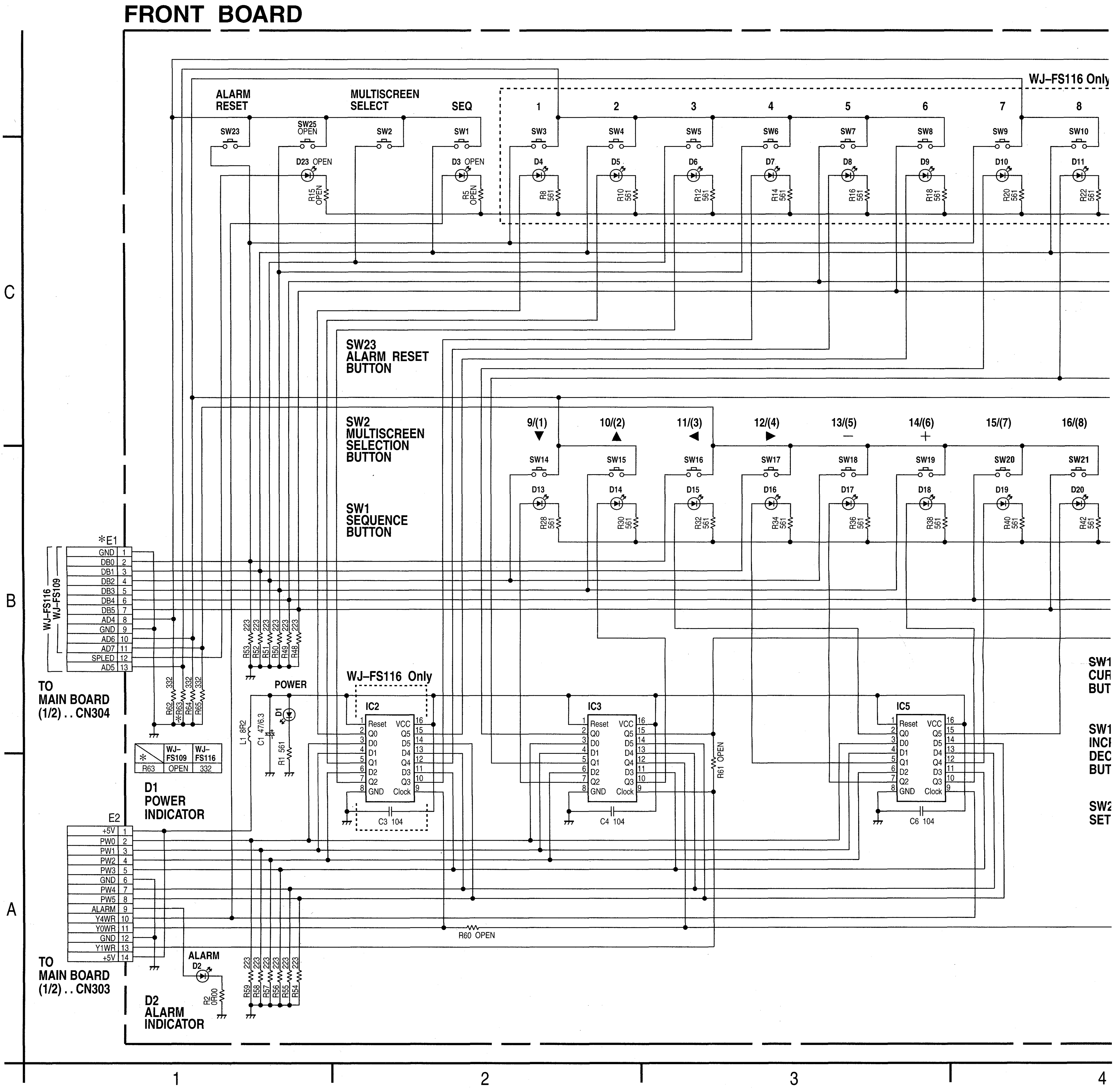
IC300	C2
IC301	B2
IC302	B1
IC304	C1
IC306	C2
IC307	C2
IC308	C2
IC309	A2
IC310	D1
IC311	D1
IC312	D1
IC316	B1
IC317	D1
IC400	B3
IC405	A3
IC502	D2
IC503	D2
IC504	D2
IC506	D3
IC507	D3
IC508	D3
IC603	C3
IC604	C3
IC605	C3
IC606	C3
IC700	B3
IC701	C4
IC703	B4
IC705	B4
IC707	D3
IC708	A2
IC709	C3
IC712	C3
IC715	D2
IC800	B2
IC801	C2
IC802	A3
IC804	A3
IC805	A3
Q100	B2
Q300	B2
Q301	E1
Q302	E1
Q303	E1
Q305	F1
Q306	D1
Q307	D1
Q400	B3
Q401	B3
Q402	B3
Q403	B3
Q404	B3
Q405	A3
Q406	A3
Q425	A3
Q500	C3
Q501	D3
Q504	D3
Q505	D3
Q506	D3
Q507	D3
Q508	D3
Q509	D4
Q510	D4
Q603	E4
Q700	D4
Q701	D4
Q702	D4
Q703	D4
Q704	A2
Q705	A2
Q706	A2
Q707	A4
Q708	A4
Q709	B4
Q710	B4
Q711	B4
Q712	C4
Q713	C4
Q714	C4
Q715	D4
Q716	D4
Q717	D4
Q718	D4
Q719	E4
Q720	E4
Q721	E4
Q722	F4
Q723	E4
Q724	B1
Q725	D4
Q726	D4
Q727	D4
Q728	D4
Q729	E4
Q800	A3
D500	D3
D501	C3
D502	D3
D503	D3
D504	D4
D700	D3
D701	A2
D702	A2
D703	A4
D704	A4
D705	B4
D706	B4
D707	B4
D708	B4
D709	C4
D710	C4
D711	C4
D712	D4
D713	D4
D714	D4
D715	E4
D716	E4
D717	E4
D718	E4
D719	E4
D720	B1

< INDEX >
D SUB BOARD

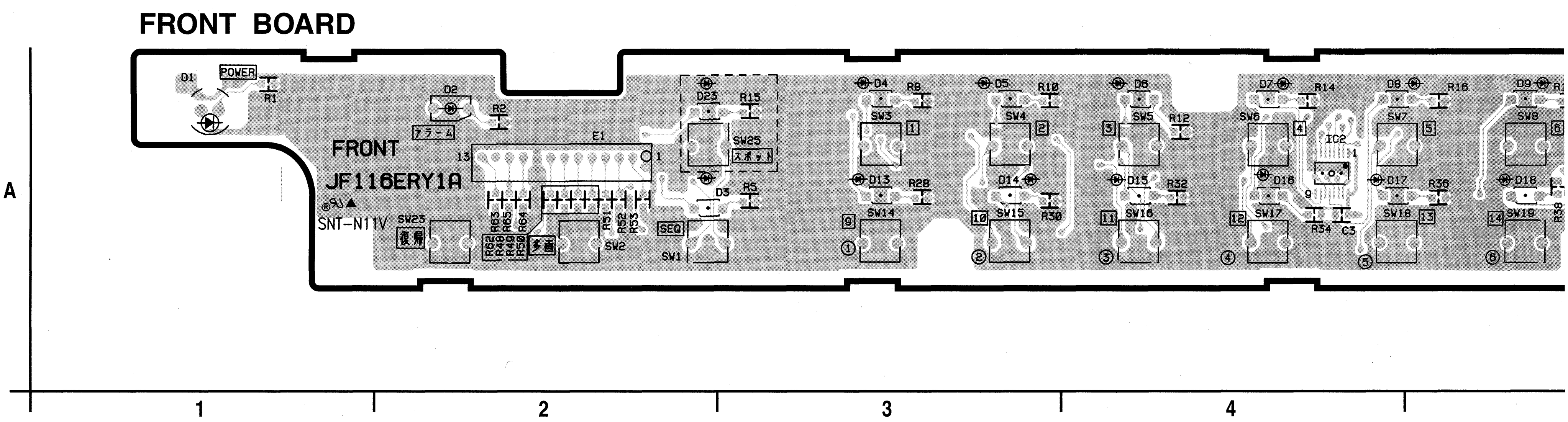
D1	F6
D2	F6
D3	E6
D4	E6

4 5 6 7

SCHEMATIC DIAGRAM OF FRONT BOARD


FRONT BOARD
ALARM RESET
MULTISCREEN SELECT
SEQ
WJ-FS116 Only
1
2
3
4
5
6
7
8
SW23
SW25 OPEN
SW2
SW1
SW3
SW4
SW5
SW6
SW7
SW8
SW9
SW10
D23 OPEN
D3 OPEN
D4
D5
D6
D7
D8
D9
D10
D11
R15 OPEN
R5 OPEN
R8 561
R10 561
R12 561
R14 561
R16 561
R18 561
R20 561
R22 561
SW23 ALARM RESET BUTTON
SW2 MULTISCREEN SELECTION BUTTON
SW1 SEQUENCE BUTTON
9/(1) ▼
10/(2) ▲
11/(3) ◀
12/(4) ▶
13/(5) −
14/(6) +
15/(7)
16/(8)
SW14
SW15
SW16
SW17
SW18
SW19
SW20
SW21
D13
D14
D15
D16
D17
D18
D19
D20
R28 561
R30 561
R32 561
R34 561
R36 561
R38 561
R40 561
R42 561
*E1
GND 1
DB0 2
DB1 3
DB2 4
DB3 5
DB4 6
DB5 7
AD4 8
GND 9
AD6 10
AD7 11
SPLED 12
AD5 13
WJ-FS116
WJ-FS109
TO MAIN BOARD (1/2) .. CN304
R62 332
*R63 332
R64 332
R65 332
R53 223
R52 223
R51 223
R50 223
R49 223
R48 223
POWER
L1 8R2
C1 47/6.3
D1
R1 561
* R63 | WJ-FS109 OPEN | WJ-FS116 332
D1 POWER INDICATOR
WJ-FS116 Only
IC2
IC3
IC5
Reset VCC
Q0 Q5
D0 D5
D1 D4
Q1 Q4
D2 D3
Q2 Q3
GND Clock
C3 104
C4 104
C6 104
R61 OPEN
R60 OPEN
E2
+5V 1
PW0 2
PW1 3
PW2 4
PW3 5
GND 6
PW4 7
PW5 8
ALARM 9
Y4WR 10
Y0WR 11
GND 12
Y1WR 13
+5V 14
TO MAIN BOARD (1/2) .. CN303
ALARM
D2
R2 0R00
R59 223
R58 223
R57 223
R56 223
R55 223
R54 223
D2 ALARM INDICATOR
SW1 CUR BUT
SW1 INCI DEC BUT
SW2 SET
A
B
C
1
2
3
4

CONDUCTOR VIEW OF FRONT BOAR


FRONT BOARD
D1
POWER
R1
D2
R2
アラーム
FRONT
JF116ERY1A
SNT-N11V
E1
13
1
SW23
復帰
R62
R48
R49
R50
R63
R65
R64
多画
R51
R52
R53
SW2
SEQ
SW1
D23
R15
SW25
スポット
D3
R5
D4
R8
SW3
D13
R28
SW14
D5
R10
SW4
D14
SW15
R30
D6
SW5
R12
D15
R32
SW16
D7
R14
SW6
IC2
D16
SW17
R34
C3
D8
R16
SW7
D17
R36
SW18
D9
SW8
D18
SW19
R38
A
1
2
3
4

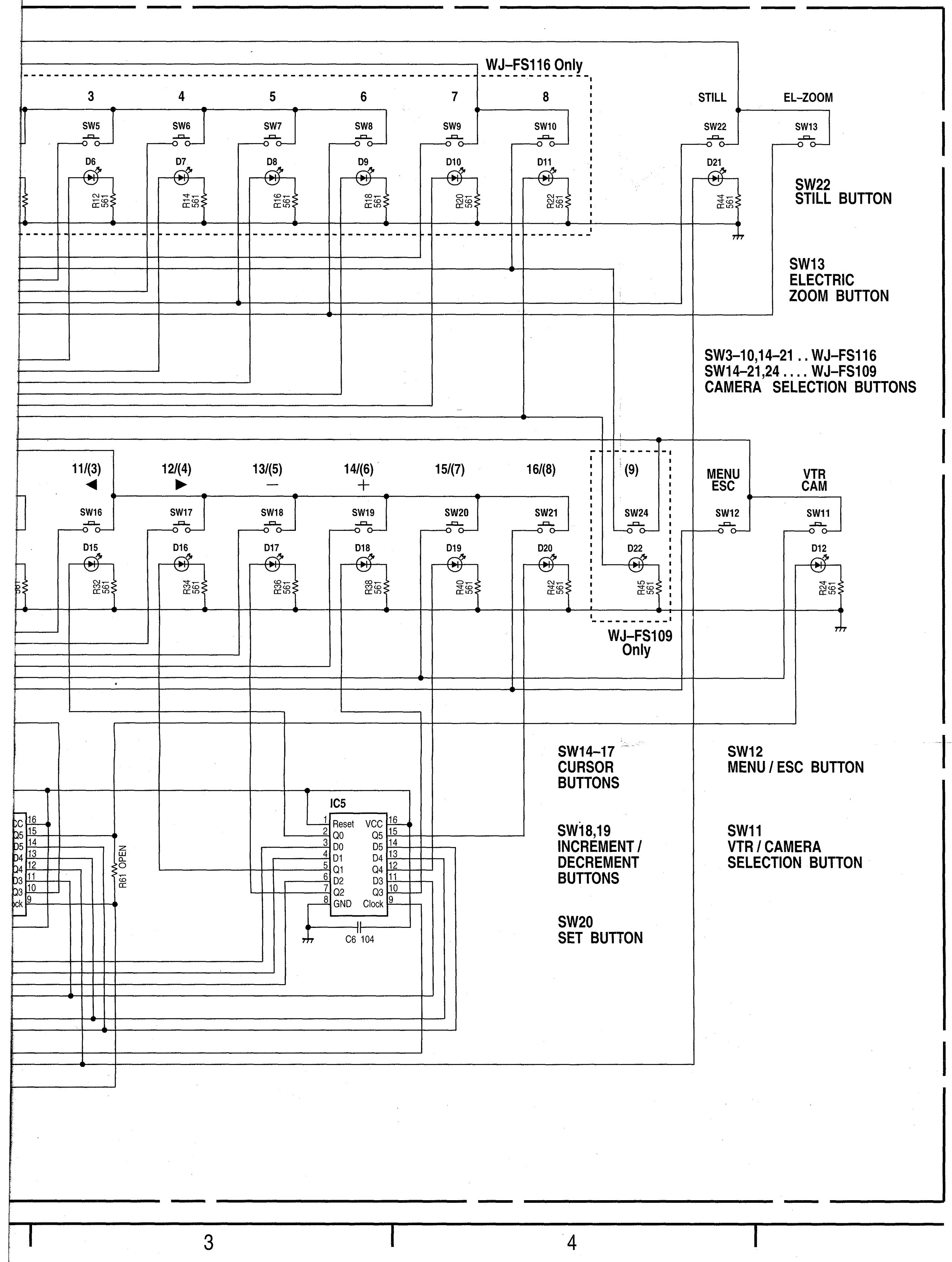
< INDEX >
WJ-FS109
FRONT BOARD

IC3	A6	D1	A1	D17	A4
IC5	A5	D2	A2	D18	A5
		D12	A7	D19	A5
		D13	A3	D20	A6
		D14	A3	D21	A6
		D15	A4	D22	A6
		D16	A4		

< INDEX >
WJ-FS116
FRONT BOARD

IC2	A4	D1	A1	D12	A7
IC3	A6	D2	A2	D13	A3
IC5	A5	D4	A3	D14	A3
		D5	A3	D15	A4
		D6	A4	D16	A4
		D7	A4	D17	A4
		D8	A4	D18	A5
		D9	A5	D19	A5
		D10	A5	D20	A6
		D11	A6	D21	A6

AGRAM OF FRONT BOARD


WJ-FS116 Only
3
4
5
6
7
8
STILL
EL-ZOOM
SW5
SW6
SW7
SW8
SW9
SW10
SW22
SW13
D6
D7
D8
D9
D10
D11
D21
R12 561
R14 561
R16 561
R18 561
R20 561
R22 561
R44 561
SW22
STILL BUTTON
SW13
ELECTRIC
ZOOM BUTTON
SW3–10,14–21 . . WJ-FS116
SW14–21,24 . . . . WJ-FS109
CAMERA SELECTION BUTTONS
11/(3) ◀
12/(4) ▶
13/(5) —
14/(6) +
15/(7)
16/(8)
(9)
MENU ESC
VTR CAM
SW16
SW17
SW18
SW19
SW20
SW21
SW24
SW12
SW11
D15
D16
D17
D18
D19
D20
D22
D12
R32 561
R34 561
R36 561
R38 561
R40 561
R42 561
R45 561
R24 561
WJ-FS109 Only
SW14–17
CURSOR
BUTTONS
SW18,19
INCREMENT /
DECREMENT
BUTTONS
SW20
SET BUTTON
SW12
MENU / ESC BUTTON
SW11
VTR / CAMERA
SELECTION BUTTON
IC5
Reset
Q0
D0
D1
Q1
D2
Q2
GND
VCC
Q5
D5
D4
Q4
D3
Q3
Clock
C6 104
R61 OPEN
3
4

< INDEX >
WJ-FS116
FRONT BOARD

IC2	A2/B2
IC3	A2/B2
IC5	A3/B3
D1	B1
D2	A1
D4	C2
D5	C2
D6	C3
D7	C3
D8	C3
D9	C3
D10	C4
D11	C4
D12	B5
D13	B2
D14	B2
D15	B3
D16	B3
D17	B3
D18	B3
D19	B4
D20	B4
D21	C4

< INDEX >
WJ-FS109
FRONT BOARD

IC3	A2/B2
IC5	A3/B3
D1	B1
D2	A1
D12	B5
D13	B2
D14	B2
D15	B3
D16	B3
D17	B3
D18	B3
D19	B4
D20	B4
D21	C4
D22	B4

< VOLTAGE >
FRONT BOARD

	IC2	IC3	IC5
Pin 1	5.0	5.0	5.0
2	4.9	0	0
3	4.9	0	0
4	2.0	2.0	2.0
5	0	0	0
6	2.0	2.0	2.0
7	0	0	0
8	0	0	0
9	5.0	5.0	5.0
10	0	0	0
11	2.0	2.0	2.0
12	0	0	0
13	2.0	0	2.0
14	2.0	2.0	2.0
15	0	0	0
16	5.0	5.0	5.0

Note: The value indicated in the schematic diagram should be read as follows:

☐ ☐ ☐

Multiplier (0 - 5)
2nd. Significant Digit (0 - 9)
1st. Siginificant Digit (1 - 9)

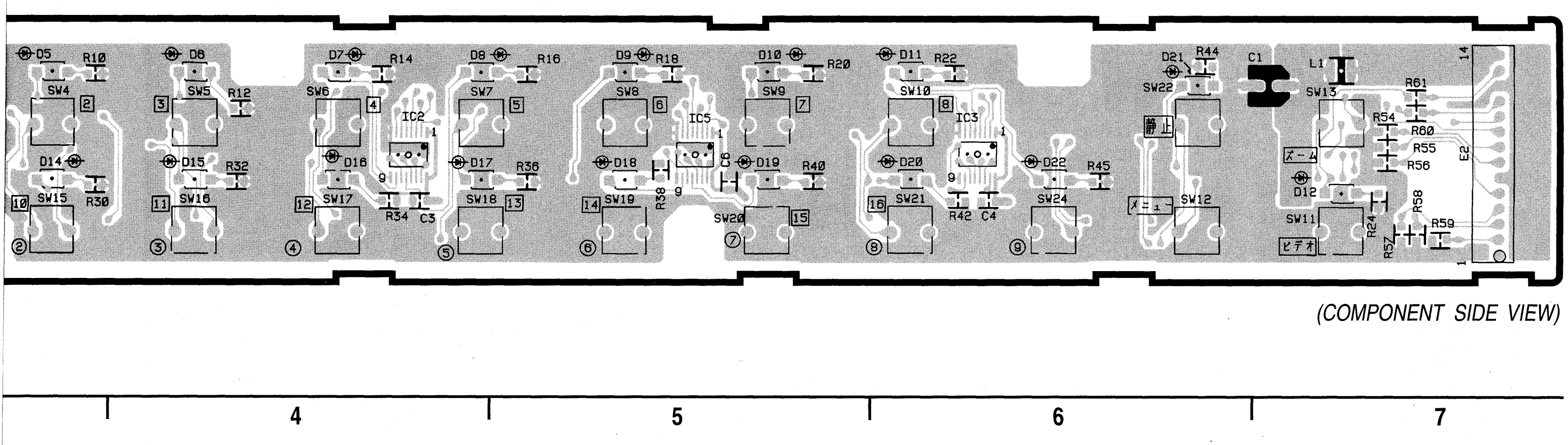
<Example>

For Resistor:
330 ➡ 33 x 10^0 = 33 Ω
561 ➡ 56 x 10^1 = 560 Ω
123 ➡ 12 x 10^3 = 12k Ω
0R00 = 0 Ω

For Capacitor:
820 ➡ 82 x 10^0 = 82 pF
102 ➡ 10 x 10^2 = 1000 pF = 0.001 µF
104 ➡ 10 x 10^4 = 100000 pF = 0.1 µF
The suffix attached to capacitance indicates a type of capacitor.

For Coil:
010 ➡ 1 x 10^0 = 1 µH
8R2 ➡ 8.2 x 10^0 = 8.2 µH
101 ➡ 10 x 10^1 = 100 µH

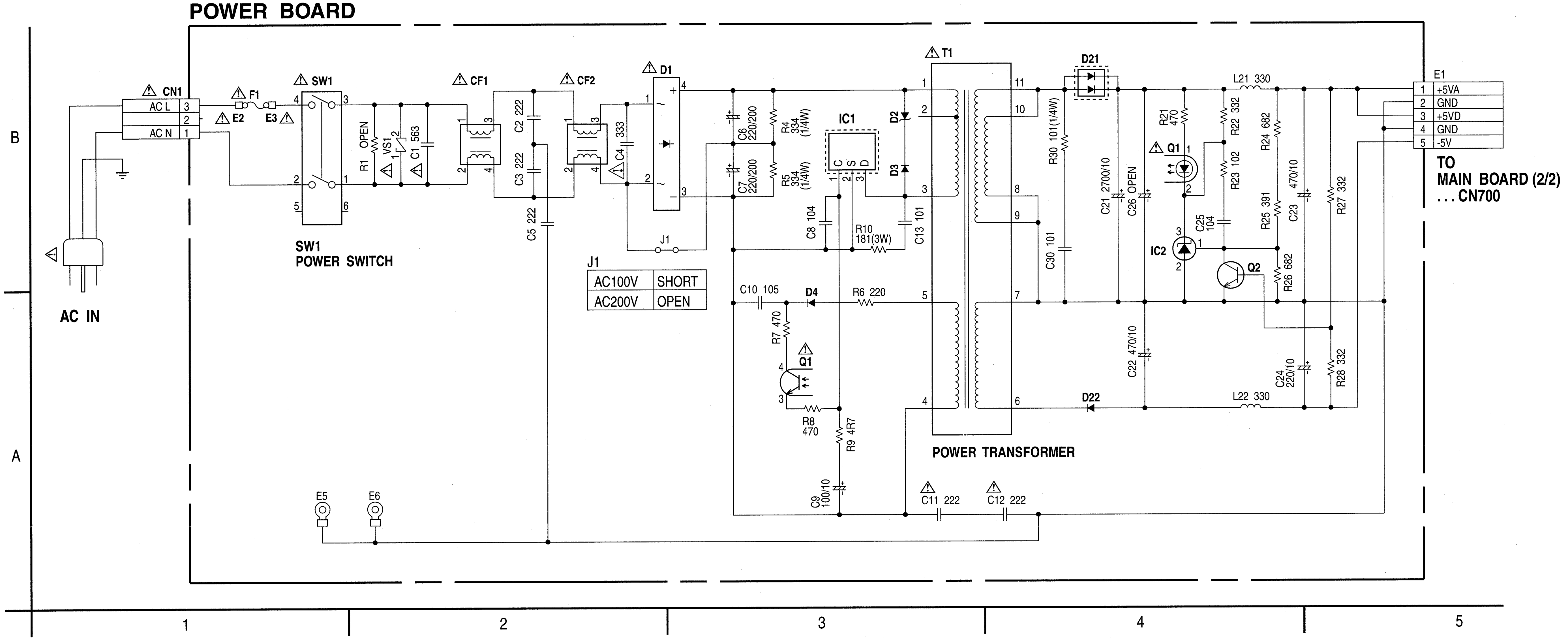
UCTOR VIEW OF FRONT BOARD


D5
R10
SW4
D14
SW15
R30
D6
SW5
R12
D15
SW16
R32
D7
R14
SW6
IC2
D16
SW17
R34
C3
D8
R16
SW7
D17
SW18
R36
D9
R18
SW8
IC5
C6
D18
SW19
R38
SW20
D10
R20
SW9
D19
R40
D11
R22
SW10
IC3
D20
SW21
R42
C4
D22
SW24
R45
D21
R44
SW22
SW12
C1
L1
SW13
D12
SW11
R24
R54
R60
R55
R56
R58
R57
R59
R61
E2
1
14
②
③
④
⑤
⑥
⑦
⑧
⑨

(COMPONENT SIDE VIEW)

4 5 6 7

SCHEMATIC DIAGRAM OF POWER BOARD


POWER BOARD
⚠ CN1
AC L 3
2
AC N 1
⚠ F1
⚠ E2
E3 ⚠
⚠ SW1
SW1
POWER SWITCH
R1 OPEN
VS1
C1 563
⚠ CF1
⚠ CF2
C2 222
C3 222
C5 222
C4 333
⚠ D1
J1
J1
AC100V SHORT
AC200V OPEN
C6 220/200
C7 220/200
R4 334 (1/4W)
R5 334 (1/4W)
IC1
C S D
C8 104
R10 181(3W)
D2
D3
C13 101
C10 105
D4
R6 220
R7 470
⚠ Q1
R8 470
R9 4R7
C9 100/10
⚠ T1
POWER TRANSFORMER
⚠ C11 222
⚠ C12 222
E5
E6
D21
R30 101(1/4W)
C30 101
C21 2700/10
C26 OPEN
C22 470/10
R21 470
⚠ Q1
IC2
C25 104
Q2
L21 330
R22 332
R23 102
R24 682
R25 391
R26 682
C23 470/10
R27 332
C24 220/10
R28 332
L22 330
D22
E1
1 +5VA
2 GND
3 +5VD
4 GND
5 -5V
TO MAIN BOARD (2/2) ... CN700
AC IN
B
A
1
2
3
4
5

Important safety notice

Components Identified by " ⚠ " mark have special characteristics for safety. When replacing any of these components, use only manufacturer's specified parts.

Note: The value indicated in the schematic diagram should be read as follows:

☐☐☐

Multiplier (0 - 5)
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104 ➡ 10 x 10^4 = 100000 pF = 0.1 μF
The suffix attached to capacitance indicates a type of capacitor.

For Coil:
010 ➡ 1 x 10^0 = 1 μH
8R2 ➡ 8.2 x 10^0 = 8.2 μH
101 ➡ 10 x 10^1 = 100 μH

< INDEX >
POWER BOARD

IC1	B3
IC2	B4
Q1	A3,B4
Q2	B4
D1	B2/B3
D2	B3
D3	B3
D4	A3
D21	B4
D22	A4

< VOLTAGE >
POWER BOARD

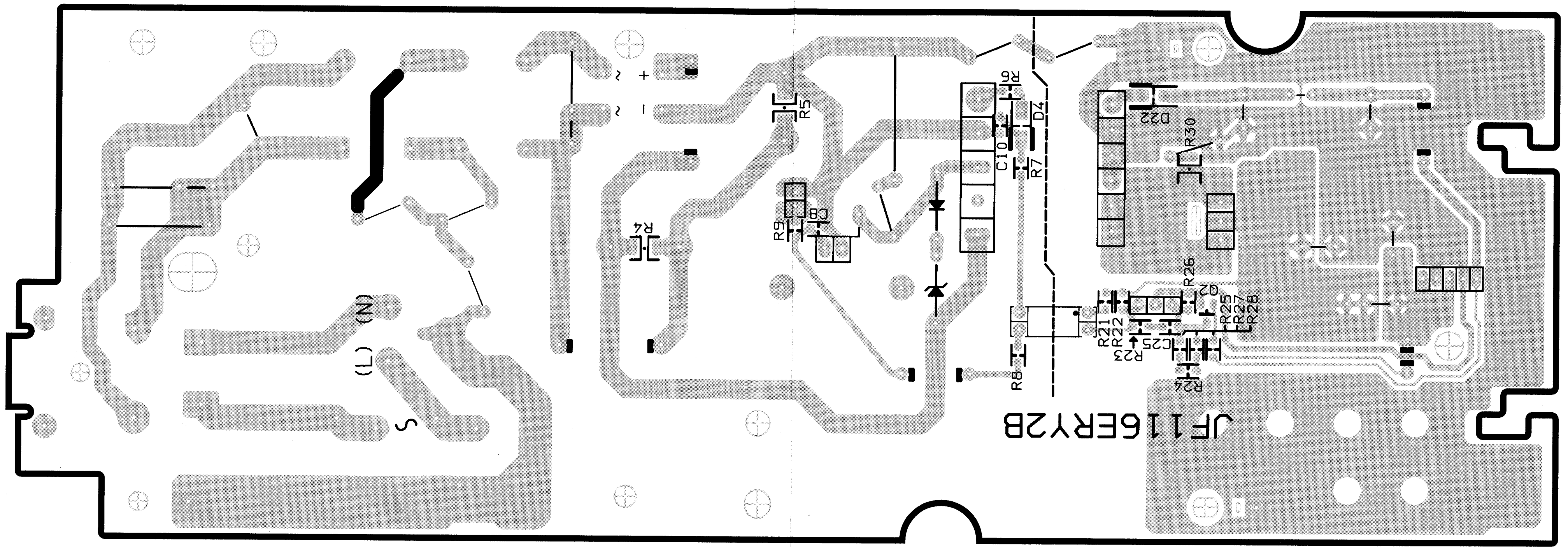
	IC1	IC2
1	–	2.5
2	– 2.5	0
3	0.5	4.0

	B	C	E
Q2	0	0	2.5

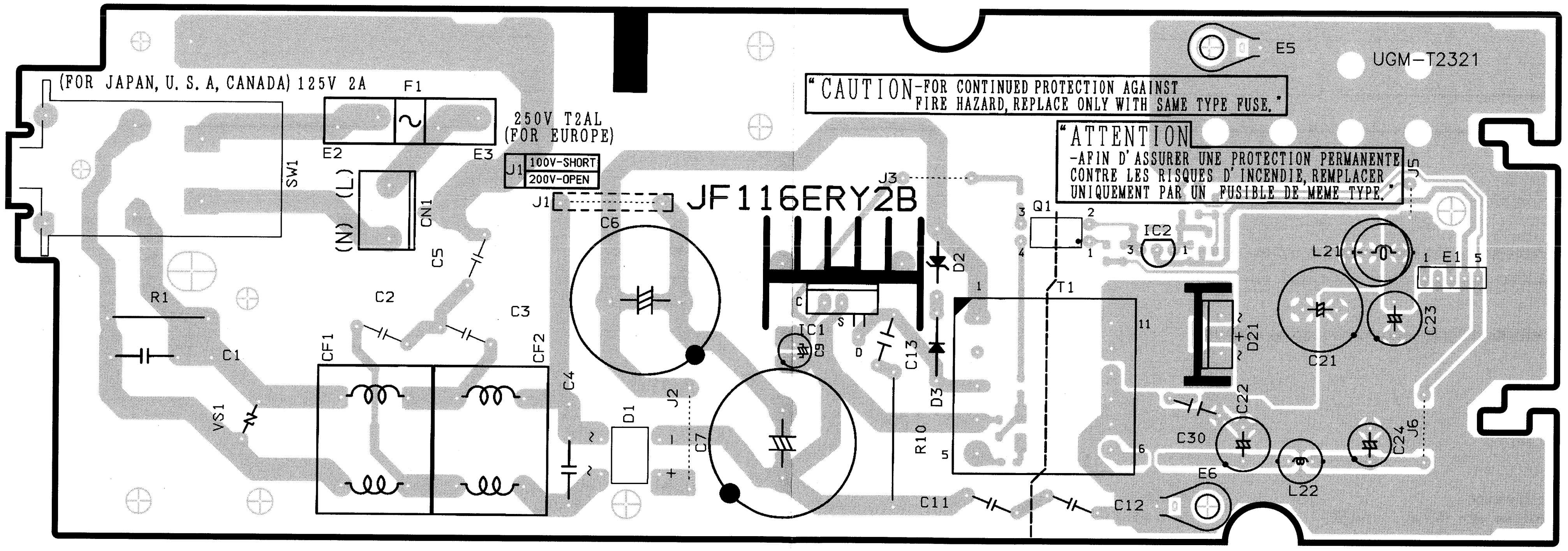
	1	2	3	4
Q1	5.0	4.0	–	– 2.0

CONDUCTOR VIEW OF POWER BOARD

POWER BOARD


D
C
(L)
(N)
R4
R5
R9
C8
C10
R7
D4
R6
D22
R30
R26
C26
R25
R27
R28
R21
R22
R23
C25
R24
R8
JF116ERY2B

(PATTERN SIDE VIEW)


B
A
1
2
3
4
5
(FOR JAPAN, U.S.A, CANADA) 125V 2A
F1
250V T2AL
(FOR EUROPE)
E2
E3
J1
100V-SHORT
200V-OPEN
SW1
(L)
(N)
CN1
C5
C6
JF116ERY2B
J3
"CAUTION-FOR CONTINUED PROTECTION AGAINST FIRE HAZARD, REPLACE ONLY WITH SAME TYPE FUSE."
"ATTENTION-AFIN D'ASSURER UNE PROTECTION PERMANENTE CONTRE LES RISQUES D'INCENDIE, REMPLACER UNIQUEMENT PAR UN FUSIBLE DE MEME TYPE."
E5
UGM-T2321
J5
Q1
IC2
L21
E1
R1
C1
C2
C3
CF1
CF2
VS1
C4
D1
J2
C7
IC1
C9
C13
D2
D3
R10
T1
D21
C21
C23
C22
C30
C24
J6
L22
E6
C11
C12

(COMPONENT SIDE VIEW)

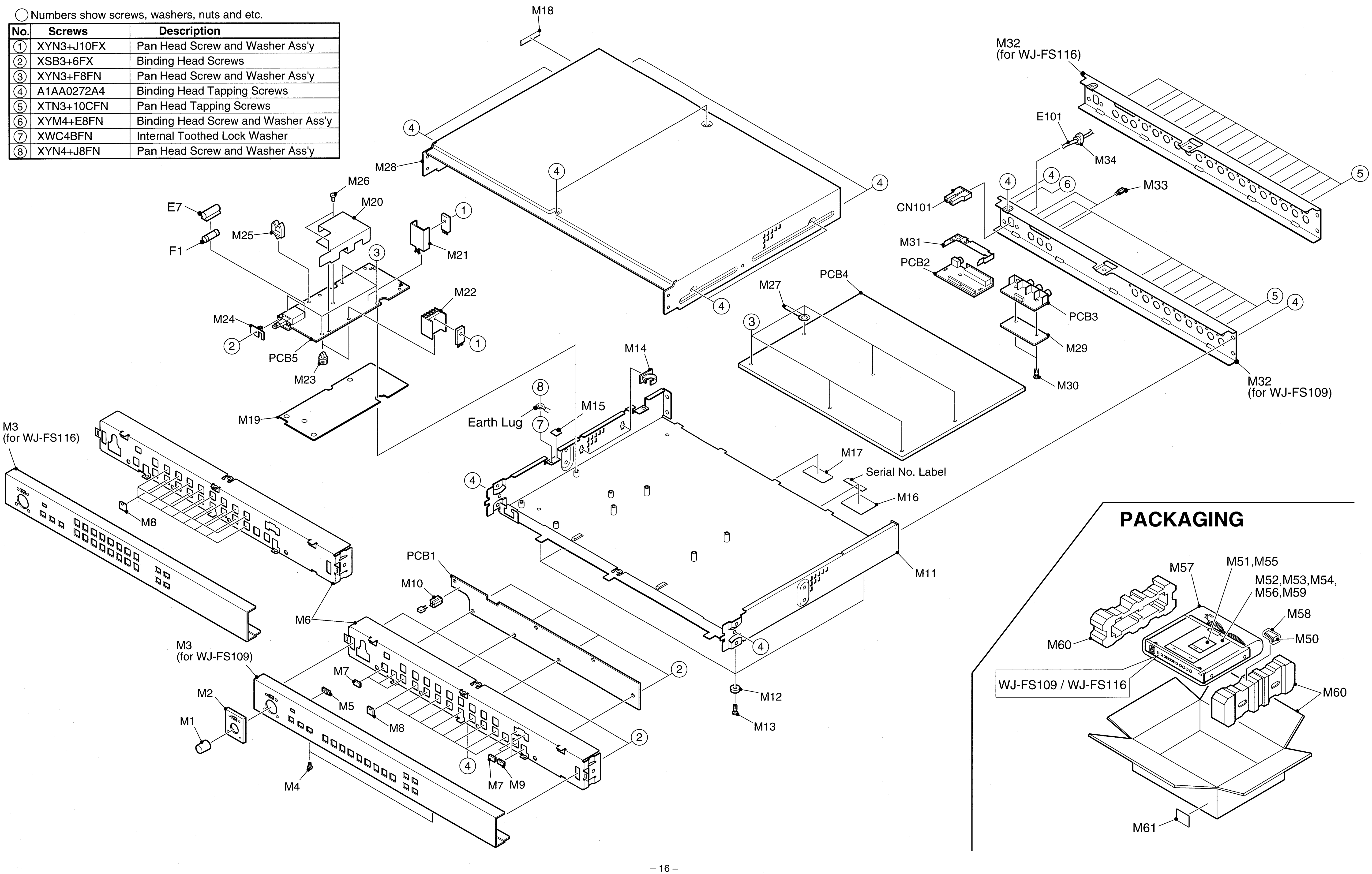
< INDEX >
POWER BOARD

IC1	A3
IC2	B4
Q1	B4
Q2	C4
D1	A3
D2	B4
D3	A4
D4	D4
D21	A4
D22	D4

EXPLODED VIEW

○Numbers show screws, washers, nuts and etc.

No.	Screws	Description
①	XYN3+J10FX	Pan Head Screw and Washer Ass'y
②	XSB3+6FX	Binding Head Screws
③	XYN3+F8FN	Pan Head Screw and Washer Ass'y
④	A1AA0272A4	Binding Head Tapping Screws
⑤	XTN3+10CFN	Pan Head Tapping Screws
⑥	XYM4+E8FN	Binding Head Screw and Washer Ass'y
⑦	XWC4BFN	Internal Toothed Lock Washer
⑧	XYN4+J8FN	Pan Head Screw and Washer Ass'y


M18
M32
(for WJ-FS116)
E101
M34
④
M28
④
④
M26
M20
E7
F1
M25
①
M21
③
M22
M24
②
PCB5
①
M23
M19
CN101
④
④
⑥
M33
⑤
M31
PCB2
PCB4
M27
③
④
PCB3
⑤
④
M29
M30
M32
(for WJ-FS109)
M14
⑧
M15
Earth Lug
⑦
M17
Serial No. Label
M16
M3
(for WJ-FS116)
M8
④
M11
PCB1
M10
M6
④
M3
(for WJ-FS109)
M7
②
M2
M5
M1
M8
②
M12
M13
M4
④
M7
M9
PACKAGING
M57
M51,M55
M52,M53,M54,
M56,M59
M58
M50
M60
WJ-FS109 / WJ-FS116
M60
M61

REPLACEMENT PARTS LIST

Important Notice

1. Components identified by " ⚠ " mark have special characteristics important for safety.
   When replacing any of these components, use only manufacturer's specified parts.
2. RTL : Retention Time Limited (No longer available after discontinuing product).

VIDEO MULTIPLEXER WJ-FS109

MISCELLANEOUS

REF. NO.	PART NO.	DESCRIPTION
E101 ⚠	YWGBSXBS	AC Power Cord Assy for WJ-FS109/B
	YWP242SXGS	AC Power Cord Assy for WF-FS109/G
CN101 ⚠	YWVAR2	Connector Cover
M1	YWA5RG0141A3	Power Switch Knob
M2 ⚠	YWV5CA0504B2	Card Holder
M3	YWV5WA2535A2	Front Panel
M4	YWV1AA1074A4	Standard Screw
M5	YWV1VA0546A3	LED Lens
M6	YWV2KA1267A1	Front Chassis
M7	YWV6JB1156A3	Button (x 5)
M8	YWV6JA1157A3	Button (x 9)
M9	YWV6JA1156A3	Button
M11	YWV2KB1233A1	Main Chassis
M12	YWV5LA0067A4	Rubber Foot (x 4)
M13	YWA2LA0070A4	Joint for Rubber Foot (x 4)
M14	YWCKT10V0	Cord Clamp
M15 ⚠	YWA7SA0689A4	Earth Mark Label
M16 ⚠	YWV7QA5270A4	Main Label for WJ-FS109/B
	YWV7QA5263A4	Main Label for WJ-FS109/G
M17 ⚠	YWV7MA0473A4	Safety Label for WJ-FS109/G
M18 ⚠	YWV7MB0099A4	Safety Label
M19 ⚠	YWV2PA1190A3	Insulator Sheet
M27	YWCS1	Cord Clamp
M28	YWV5EA2355A1	Upper Cover
M29 ⚠	YWV2PA1211A4	Insulator Sheet
M30	YW0920	Rivet
M31	YWV2SA4742A3	Mounting Angle for Rear Board
M32	YWV5WA2536A2	Rear Panel
M33	JFS2.6SB1WM	Special Screw
M34 ⚠	YWSR5N4	Cord Clamp

FRONT BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB1 (RTL)	JF109EKY1A	Printed Circuit Board Assy	
IC3	C0JBAF000252	IC	
IC5	C0JBAF000252	IC	
D1	LN342GP	LED	
D2	B3AAA0000380	LED	
D12-22	LN1361CTR	LED	
R1	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R2	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R24	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R28	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R30	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R32	ERJ6GEYJ561	Carbon	560ohms 1/10W
R46	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R36	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R38	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R40	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R42	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R44,45	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R48-59	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R62	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R64,65	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
C1	EEVHB0J470R	Electrolytic	47 µF 6.3V
C4,6	MCUN1E104ZFN	Ceramic	0.1 µF
L1	G1C8R2J00002	Coil	
SW1,2	EVQ11A05R	Push Switch	
SW11-24	EVQ11A05R	Push Switch	
E1	ELY122V511	Wire Assy for Main Board CN304	
E2	K1PA14C00001	Wire Assy for Main Board CN303	
M10	YWLDS90K	Spacer	

D SUB BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB2 (RTL)	JF109EKB1A	Printed Circuit Board Ass'y	
R1-10	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R12,13	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R14	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R15,23	ERJ6GEYJ101	Carbon	100 ohms 1/10W
C1-10	MCUN1E104ZFN	Ceramic	0.1 µF
C12-15	MCUN1E104ZFN	Ceramic	0.1 µF
C23	MCUN1E104ZFN	Ceramic	0.1 µF
L1-10	G1C101J00002	Coil	100 µH
L12,13	G1C101J00002	Coil	100 µH
L14	G1C151J00001	Coil	150 µH
L15	G1C101J00002	Coil	100 µH
L23	G1C101J00002	Coil	100 µH
L24	G1C151J00001	Coil	150 µH
CN1	YWJBY25S1A3G	Connector	
JK2	K2HA101B0004	Jack	
E1	K1PA12C00001	Wire Assy for Main Board CN301	
E2	K1PA06C00003	Wire Assy for Main Board CN302	
E3	K1PA02C00002	Wire Assy for Main Board CN300	

BNC BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB3 (RTL)	JF109EKC1A	Printed Circuit Board Assy	
R2	D1BD68R00001	Metal	68 ohms
R3	YWR1220Q750D	Metal	75 ohms
R4	YWR1220P122D	Metal	1.2K ohms
CN1	K1QBA3AB0001	Connector	
E1	FS116C01A	Wire Assy for Main Board CN717	

MAIN BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB4 (RTL)	JF109EKZ1A	Printed Circuit Board Assy	
IC300	C0JBAE000016	IC	
IC301	YWBR93LC66RF	IC	
IC302	YWM380670NET	IC	
IC304	YWLH5168N80L	IC	
IC306,307	YWMC74AC138M	IC	
IC308	C0JBAZ000995	IC	
IC309	C0EBH0000063	IC	
IC310	YWMCHC257E	IC	
IC312	YWMCHC257E	IC	
IC316	74HC374ADTE	IC	
IC317	YW74HC08DTE	IC	
IC400	C0FBAD000003	IC	
IC405	YW74HC04ADTE	IC	
IC502	YWN0KZ	LSI	
IC503,504	C3ABKG000023	IC	
IC506	C0JBAA000097	IC	
IC507,508	YWTC4W53FUL	IC	
IC603	YWMVT85038	IC	
IC604,605	YWTC4W53FUL	IC	
IC606	C0JBAA000097	IC	
IC700	YWMCHC4053E	IC	
IC701	YWMCHC4051E	IC	
IC703	YWMCHC4051E	IC	
IC705	YWMCHC4051E	IC	
IC707	YWNJM2244M	IC	
IC708	C0BBBA000023	IC	
IC709	YW74HC04ADTE	IC	
IC710	C0JBAS000089	IC	
IC712	C9ZB00000121	IC	
IC715	C0JBAZ000995	IC	
IC800	C1ZAZ0001280	IC	
IC801	YW6016TC1443	IC	
IC802	YWTC7S00FL	IC	
IC804	YWNJM2229M	IC	
IC805	YW74HC04ADTE	IC	
Q301	2SA1037KT47	Transistor	
Q300,302	2SC2412KT46	Transistor	
Q303	B1ABGD000010	Transistor	
Q305-307	YWXN0450100L	Transistor	
Q400	2SC2412KT46	Transistor	
Q401	2SA1037KT47	Transistor	
Q402	2SC2412KT46	Transistor	
Q403-405	2SC2412KT46	Transistor	
Q406	2SA1037KT47	Transistor	
Q425	2SC2412KT46	Transistor	
Q504	2SC2412KT46	Transistor	
Q500,501	B1CBBF000007	Transistor	
Q505,506	2SC2412KT46	Transistor	
Q508	2SC2412KT46	Transistor	
Q509,510	B1ABGD000010	Transistor	
Q603	2SA1037KT47	Transistor	
Q700	2SA1037KT47	Transistor	
Q701	2SC2412KT46	Transistor	
Q702-704	2SC2412KT46	Transistor	
Q705	2SA1037KT47	Transistor	
Q706	2SC2412KT46	Transistor	
Q707-715	2SC3837KT47	Transistor	
Q723	2SC3837KT47	Transistor	
Q724-726	2SC2412KT46	Transistor	
Q727-729	2SA1037KT47	Transistor	
Q800	2SC2412KT46	Transistor	
Q805	2SA1037KT47	Transistor	
D500-503	MA2Z372E0L	Diode	
D504	B0ADCC000003	Diode	
D700-711	B0ADCC000003	Diode	
D719,720	B0ADCC000003	Diode	
R70-75	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R76	ERJ3GEYJ122	Carbon	1.2K ohms 1/16W
R77	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R301	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R302	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R304,305	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R307	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R309	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R311	ERJ6GEYJ102	Carbon	1K ohms 1/10W
R312	ERJ6GEYJ103	Carbon	10K ohms 1/10W
R313	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R316	YWR1220P682D	Metal	6.8K ohms
R317	YWR1220P302D	Metal	3K ohms

REF. NO.	PART NO.	DESCRIPTION	
R318	ERJ6GEYJ104	Carbon	100K ohms 1/10W
R319	ERJ6GEYJ103	Carbon	10K ohms 1/10W
R320	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R321,322	ERJ6GEYJ221	Carbon	220 ohms 1/10W
R325	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R326	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R327	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R328	ERJ3GEYJ393	Carbon	39K ohms 1/16W
R329	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R330	ERJ3GEYJ563	Carbon	56K ohms 1/16W
R331	ERJ3GEYJ562	Carbon	5.6K ohms 1/16W
R332	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R333	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R334	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R335	ERJ3GEYJ104	Carbon	100K ohms 1/16W
R336	ERJ3GEYJ564	Carbon	560K ohms 1/16W
R337	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R338	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R339	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R340	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R341	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R358	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R359	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R360	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R361	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R362	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R363	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R364	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R365	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R366	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R367	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R368	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R369	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R370	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R371	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R372	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R373	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R374	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R375,376	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R377-394	ERJ3GEYJ121	Carbon	120 ohms 1/16W
R395	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R396	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R400	D0YBR0000007	Carbon	0 ohm 1/16W
R416	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R417	D0YBR0000007	Carbon	0 ohm 1/16W
R418	D0YBR0000007	Carbon	0 ohm 1/16W
R419	ERJ3GEYJ331	Carbon	330 ohms 1/16W
R422	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R423	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R424	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R425,426	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R427	D0YBR0000007	Carbon	0 ohm 1/16W
R428	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R429	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R430	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R440	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R441	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R442	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R443	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R444	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R445	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R449	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R450,451	YWR0816P102D	Metal	1K ohms 1/16W
R452	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R453	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R477	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R491	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R501	ERJ3GEYJ202	Carbon	2K ohms 1/16W
R502	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R504	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R505,509	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R510	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R511	D0YBR0000007	Carbon	0 ohm 1/16W
R512	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R513	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R514	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R515	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R516,517	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R518	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R519	ERJ3GEYJ105	Carbon	1M ohms 1/16W
R520	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R521	ERJ6GEYJ201	Carbon	200 ohms 1/10W
R522	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R523-528	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R529,530	ERJ3GEYJ151	Carbon	150 ohms 1/16W
R531	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R532	ERJ3GEYJ151	Carbon	150 ohms 1/16W
R533	ERJ3GEYJ105	Carbon	1M ohms 1/16W
R534	D0YBR0000007	Carbon	0 ohm 1/16W
R535	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R536	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R537	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R538	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R539	ERJ3GEYJ105	Carbon	1M ohms 1/16W
R540	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R560	ERJ3GEYJ362	Carbon	3.6K ohms 1/16W
R563	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R564	ERJ3GEYJ152	Carbon	1.5K ohms 1/16W
R566	ERJ3GEYJ272	Carbon	2.7K ohms 1/16W
R567	ERJ3GEYJ122	Carbon	1.2K ohms 1/16W
R568,569	ERJ3GEYJ560	Carbon	56 ohms 1/16W
R570	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R571-573	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R574582	YWR0816P242D	Metal	2.4K ohms 1/16W
R583589	YWR0816P122D	Metal	1.2K ohms 1/16W
R590	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R595-599	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R642649	ERJ3GEYJ331	Carbon	330 ohms 1/16W
R659	ERJ3GEYJ333	Carbon	33K ohms 1/16W
R700	ERJ3GEYJ202	Carbon	2K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R701	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R702	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R703	YWR0816P222D	Metal	2.2K ohms 1/16W
R704	YWR0816P102D	Metal	1K ohms 1/16W
R705	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R706	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R707	ERJ3GEYJ392	Carbon	3.9K ohms 1/16W
R708	ERJ3GEYJ331	Carbon	330 ohms 1/16W
R709	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R710	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R711	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R712	ERJ3GEYJ242	Carbon	2.4K ohms 1/16W
R713	ERJ6GEYJ221	Carbon	220 ohms 1/10W
R714	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R715	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R716	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R717	ERJ6GEYJ222	Carbon	2.2K ohms 1/16W
R718	ERJ6GEYJ152	Carbon	1.5K ohms 1/10W
R719	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R720	ERJ6GEYJ222	Carbon	2.2K ohms 1/16W
R721	ERJ6GEYJ102	Carbon	1K ohms 1/10W
R722,723	ERJ6GEYJ103	Carbon	10K ohms 1/10W
R724	ERJ6GEYJ104	Carbon	100K ohms 1/10W
R725	ERJ6GEYJ224	Carbon	220K ohms 1/10W
R726	ERJ6GEYJ153	Carbon	15K ohms 1/10W
R727	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R728	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R729	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R730	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R731	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R732	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R733	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R734	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R735	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R736	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R737	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R738	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R739	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R740	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R741	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R742	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R743	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R744	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R745	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R746	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R747	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R748	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R749	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R750	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R751	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R752	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R753	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R775	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R776	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R777	ERJ6GEYJ101	Carbon	100 ohms 1/10W

REF. NO.	PART NO.	DESCRIPTION	
R778-786	YWR1220Q750D	Metal	75 ohms
R794	YWR1220Q750D	Metal	75 ohms
R795	ERJ6GEYJ273	Carbon	27K ohms 1/10W
R796	ERJ6GEYJ473	Carbon	47K ohms 1/10W
R797	ERJ6GEYJ103	Carbon	10K ohms 1/10W
R798	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R799	ERJ3GEYJ123	Carbon	12K ohms 1/16W
R801	D0YBR0000007	Carbon	0 ohm 1/16W
R802	ERJ3GEYJ154	Carbon	150K ohms 1/16W
R803	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R804	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R807	D0YBR0000007	Carbon	0 ohm 1/16W
R808	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R809	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R810	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R811	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R812	ERJ3GEYJ391	Carbon	390 ohms 1/16W
R813	ERJ3GEYJ152	Carbon	1.5K ohms 1/16W
R814	ERJ3GEYJ474	Carbon	470K ohms 1/16W
R815-817	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R818	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R819,820	ERJ3GEYJ362	Carbon	3.6K ohms 1/16W
R822	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R823,824	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R825	YWR0816R134D	Metal	130K ohms 1/16W
R826	YWR0816P183D	Metal	18K ohms 1/16W
R827	ERJ3GEYJ363	Carbon	36K ohms 1/16W
R828	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R829,830	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R831	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R833	D0YBR0000007	Carbon	0 ohm 1/16W
R836-843	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R901	ERJ3GEYJ752	Carbon	7.5K ohms 1/16W
R902,903	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R904	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R905	ERJ3GEYJ154	Carbon	150K ohms 1/16W
R906	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R907	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R908	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R909,910	D0YBR0000007	Carbon	0 ohm 1/16W
R913	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R914	ERJ3GEYJ682	Carbon	6.8K ohms 1/16W
R915	ERJ3GEYJ271	Carbon	270 ohms 1/16W
R916	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R927	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R928	ERJ3GEYJ393	Carbon	39K ohms 1/16W
R929	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R930	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R931	D0YBR0000007	Carbon	0 ohm 1/16W
R939	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R942	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R944	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R949	ERJ6GEYJ222	Carbon	2.2K ohms 1/16W
R950	ERJ6GEYJ102	Carbon	1K ohms 1/10W
R953	ERJ3GEYJ223	Carbon	22K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R955	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R957	ERJ3GEYJ223	Carbon	22K ohms 1/16W
VR400,404	EVM1DSW30B13	Variable Resistor	1K ohms
VR501	EVM1DSW30B13	Variable Resistor	1K ohms
C300,301	F1J1E104A044	Ceramic	0.1 µF
C306	F1J1E104A044	Ceramic	0.1 µF
C307	F1J1C105A004	Ceramic	1µF
C308,309	YF400300CHJT	Ceramic	30 pF
C310	F1J1E104A044	Ceramic	0.1 µF
C311	EEVHB0J101P	Electrolytic	100 µF 6.3V
C312-314	F1J1E104A044	Ceramic	0.1 µF
C317	F1J1E104A044	Ceramic	0.1 µF
C318	YF400223XKT	Ceramic	0.022 µF
C319	F1H1H103A013	Ceramic	0.01 µF
C321	F1H1A105A004	Ceramic	1 µF
C322	MCUV1E104ZFV	Ceramic	0.1 µF
C323	F1H1A105A004	Ceramic	1 µF
C324,325	F1H1H103A013	Ceramic	0.01 µF
C334-342	F1H1H103A013	Ceramic	0.01 µF
C343	F1J1E104A044	Ceramic	0.1 µF
C345	F1J1E104A044	Ceramic	0.1 µF
C346	EEVHB0J101P	Electrolytic	100 µF 6.3V
C350	MCUV1E104ZFV	Ceramic	0.1 µF
C400	MCUV1E104ZFV	Ceramic	0.1 µF
C402	MCUV1E104ZFV	Ceramic	0.1 µF
C404,405	MCUV1E104ZFV	Ceramic	0.1 µF
C413	EEVHB0J101P	Electrolytic	100 µF 6.3V
C414	F1J1C105A004	Ceramic	1 µF
C415	MCUV1E104ZFV	Ceramic	0.1 µF
C419	EEVHB0J101P	Electrolytic	100 µF 6.3V
C420	F1H1H560A004	Ceramic	56 pF
C423	F1H1H510A231	Ceramic	51 pF
C424	F1J1H330A410	Ceramic	33 pF
C425	F1H1H220A004	Ceramic	22 pF
C455	MCUV1E104ZFV	Ceramic	0.1 µF
C500	F1J1E104A044	Ceramic	0.1 µF
C501	F1H1C104A001	Ceramic	0.1 µF
C502	F1H1H222A013	Ceramic	2200 pF
C503	F1H1H331A650	Ceramic	330 pF
C504,505	F1H1H100A017	Ceramic	10 pF
C506,507	F1H1H331A650	Ceramic	330 pF
C508	MCUV1E104ZFV	Ceramic	0.1 µF
C509	YW6CV1000GX	Electrolytic	100 µF 6.3V
C510	F1J1E104A044	Ceramic	0.1 µF
C511	F2H0J3310003	Electrolytic	330 µF 6.3V
C512-514	F1J1E104A044	Ceramic	0.1 µF
C515	F1H1H8R0A226	Ceramic	8 pF
C516	F1H1H331A650	Ceramic	330 pF
C518	F1H1H221A004	Ceramic	220 pF
C520	F1J1C105A004	Ceramic	1 µF
C521	F1H1H331A650	Ceramic	330 pF
C522	F1H1H5R00001	Ceramic	5 pF
C523	F1H1H331A650	Ceramic	330 pF
C525	F1H1H300A004	Ceramic	30 pF
C526	F1H1H331A650	Ceramic	330 pF

REF. NO.	PART NO.	DESCRIPTION	
C528	F1J1E104A044	Ceramic	0.1 µF
C529-531	F1J1E104A044	Ceramic	0.1 µF
C534,535	F1J1E104A044	Ceramic	0.1 µF
C537	EEVHB0J101P	Electrolytic	100 µF 6.3V
C540	F1H1H101A004	Ceramic	100 pF
C542	MCUV1E104ZFV	Ceramic	0.1 µF
C544	EEVHB0J101P	Electrolytic	100 µF 6.3V
C547	EEVHB0J101P	Electrolytic	100 µF 6.3V
C549	EEVHB0J221P	Electrolytic	220 µF 6.3V
C551,552	F1J1E104A044	Ceramic	0.1 µF
C553	F1H1H333A002	Ceramic	0.033 µF
C554	F1H1H222A013	Ceramic	2200 pF
C555	F1H1A105A004	Ceramic	1 µF
C613-615	F1J1E104A044	Ceramic	0.1 µF
C617	EEVHB0J101P	Electrolytic	100 µF 6.3V
C618-624	F1H1E104A016	Ceramic	0.1 µF
C630	F1H1E104A016	Ceramic	0.1 µF
C632-634	F1J1E104A044	Ceramic	0.1 µF
C635	F1H1H331A650	Ceramic	330 pF
C636	F1H1A105A004	Ceramic	1 µF
C700-702	F1J1E104A044	Ceramic	0.1 µF
C703	EEVHB0J101P	Electrolytic	100 µF 6.3V
C704	F1J1E104A044	Ceramic	0.1 µF
C707	EEVHB0J101P	Electrolytic	100 µF 6.3V
C708	YW6CV1000GX	Electrolytic	100 µF 6.3V
C709	F1J1E104A044	Ceramic	0.1 µF
C710	F1J1E104A044	Ceramic	0.1 µF
C713	EEVHB0J101P	Electrolytic	100 µF 6.3V
C714	YW6CV1000GX	Electrolytic	100 µF 6.3V
C715	F1J1E104A044	Ceramic	0.1 µF
C716	F1J1E104A044	Ceramic	0.1 µF
C719	EEVHB0J221P	Electrolytic	220 µF 6.3V
C720	F1J1E104A044	Ceramic	0.1 µF
C721	F1J1E104A044	Ceramic	0.1 µF
C722	MCUV1E104ZFV	Ceramic	0.1 µF
C724	ECUV1H103KBN	Ceramic	0.01 µF
C725	EEVHB0J101P	Electrolytic	100 µF 6.3V
C726	YF400563XKT	Ceramic	0.056 µF
C727-729	F1J1E104A044	Ceramic	0.1 µF
C730	EEVHB0J101P	Electrolytic	100 µF 6.3V
C731	F1J1E104A044	Ceramic	0.1 µF
C732	EEVHB0J101P	Electrolytic	100 µF 6.3V
C733	F1J1E104A044	Ceramic	0.1 µF
C734	EEVHB0J101P	Electrolytic	100 µF 6.3V
C735	F1J1E104A044	Ceramic	0.1 µF
C736	EEVHB0J101P	Electrolytic	100 µF 6.3V
C737	F1J1E104A044	Ceramic	0.1 µF
C738	EEVHB0J101P	Electrolytic	100 µF 6.3V
C740	EEVHB0J101P	Electrolytic	100 µF 6.3V
C742	EEVHB0J101P	Electrolytic	100 µF 6.3V
C744	EEVHB0J101P	Electrolytic	100 µF 6.3V
C746	EEVHB0J101P	Electrolytic	100 µF 6.3V
C761	EEVHB0J221P	Electrolytic	220 pF 6.3V
C763,764	EEVHB0J101P	Electrolytic	100 µF 6.3V
C766	EEVHB0J221P	Electrolytic	220 pF 6.3V

REF. NO.	PART NO.	DESCRIPTION	
C767	F1H1H180A004	Ceramic	8 pF
C768	F1H1C5630001	Ceramic	0.056 µF
C771	F1H1H101A004	Ceramic	100 pF
C772	F1H1A105A004	Ceramic	1 µF
C773	F1H1H331A650	Ceramic	330 pF
C774	F1H1H102A004	Ceramic	1000 pF
C775	F1H1A105A004	Ceramic	1 µF
C777	F1H1H300A004	Ceramic	30 pF
C778	F1H1H330A231	Ceramic	33 pF
C786,787	YW6CV1000GX	Electrolytic	1000 µF 6.3V
C789	EEVHB0J101P	Electrolytic	100 µF 6.3V
C802-804	F1H1E104A016	Ceramic	0.1 µF
C805	EEVHB0J221P	Electrolytic	220 µF 6.3V
C806-809	F1H1E104A016	Ceramic	0.1 µF
C811	F1H1A105A004	Ceramic	1 µF
C812	F1H1H331A650	Ceramic	330 pF
C813	F1H1H221A004	Ceramic	220 pF
C815	F1H1H332A013	Ceramic	3300 pF
C816	F1H1H152A013	Ceramic	1500 pF
C817	F1H1A105A004	Ceramic	1 µF
C819	F1H1H102A004	Ceramic	1000 pF
C820	MCUV1E104ZFV	Ceramic	0.1 µF
C821	F1H1H391A004	Ceramic	39 pF
C822	F1H1H3610001	Ceramic	360 pF
C827	F1H1H391A004	Ceramic	39 pF
C826	MCUV1E104ZFV	Ceramic	0.1 µF
C828	F1H1H102A004	Ceramic	1000 pF
C829	MCUV1E104ZFV	Ceramic	0.1 µF
C840	F1J1H101A442	Ceramic	100 pF
C841	F1J1E104A044	Ceramic	0.1 µF
C842	F1J1H101A442	Ceramic	100 pF
CT500,700	ECRJA020E11W	Trimmer Capacitor	
L300,303	G1C8R2J00002	Coil	8.2 µH
L400	G1C100J00001	Coil	10 µH
L401	G1C220J00001	Coil	22 µH
L500	EIC4EJ011E	Coil	
L502,505	G1C8R2J00002	Coil	8.2 µH
L506	G1C8R2J00002	Coil	8.2 µH
L600,700	G1C8R2J00002	Coil	8.2 µH
L701-705	G1C8R2J00002	Coil	8.2 µH
L708,709	G1C5R6J00001	Coil	5.6 µH
L710	G1C330J00002	Coil	33 µH
L711,712	G1C8R2J00002	Coil	8.2 µH
SW300	ESD11V120	Slide Switch	
X300	YWCSA7.37MTZ	Oscillator	
X500	H0J270500003	Crystal Oscillator	
X501	H0J177500007	Crystal Oscillator	
X800	YFCSB503F2	Crystal Oscillator	
CN300	YW530140210	8-pin Connector	
CN301	YW530141210	12-pin Connector	
CN302	YW530140610	6-pin Connector	
CN303	K1KA14A00025	14-pin Connector	
CN304	YW530141110	11-pin Connector	
CN700	K1KA05A00082	5-pin Connector	
CN701-70	K1QBB2CB0003	Connector	

REF. NO.	PART NO.	DESCRIPTION	
CN717	YWB6BPHKS	6-pin Connector	
BZ300	PKM22EPP4002	Buzzer	
E301-306	YWMEP1866	Terminal	
TP305	YWRCT2125TPV	Test Point	
TP306-309	YW32BM7R5	Test-pin	
TP310,311	YWRCT2125TPV	Test-pin	
TP505	YWRCT2125TPV	Test-pin	
TP508	YWRCT2125TPV	Test-pin	
TP700,701	YWRCT2125TPV	Test-pin	

POWER BOARD

REF. NO.	PART NO.	DESCRIPTION	
PCB5 (RTL)	JF116EKY2A	Printed Circuit Board Assy	
IC1 ⚠	MIP0224SY	IC	
IC2	YWTA76431S	IC	
Q1 ⚠	YWPC123FY2	Photo Coupler	
Q2	2SC2412KT46	Transistor	
VS1 ⚠	YWJ07N471KP	ZNR	
D1 ⚠	YWDB155G	Diode	
D2	YWP6KE180A	Diode	
D3	YWERB3710	Diode	
D4	YWSC2012	Diode	
D21	B0JBQG000001	Diode	
D22	B0JCMG000003	Diode	
R4,5	ERJ14YJ334H	Carbon	330K ohms 1/4W
R6	ERJ6GEYJ220	Carbon	22 ohms 1/10W
R7,8	YF2116470JT	Carbon	47 ohms 1/10W
R9	ERJ6GEYJ4R7	Carbon	4.7 ohms 1/10W
R10	ERG3SJ181P	Metal	180 ohms 3W
R21	YF2116470JT	Carbon	47 ohms 1/10W
R22	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R23	ERJ6GEYJ102	Carbon	1K ohms 1/10W
R24	ERA6YED682V	Metal	6.8K ohms 6W
R25	ERJ6GEYJ391	Carbon	390 ohms 1/10W
R26	ERA6YED682V	Metal	6.8K ohms 1/10W
R27,28	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R30	ERJ14YJ101H	Carbon	100 ohms 1/4W
C1 ⚠	ECQU2A563MV	Plastic	0.056 µF 100V
C2,3	ECKDRS222MEY	Ceramic	2200 pF
C4 ⚠	ECQU2A333MV	Plastic	0.033 µF 100V
C5	ECKDRS222MEY	Ceramic	2200 pF
C6,7	EC0S2DA221BB	Electrolytic	220 µF 200V
C8	MCUV1E104KBN	Ceramic	0.1 µF
C9	EEUEB1A101	Electrolytic	100 µF 10V
C10	F1J1C105A004	Ceramic	1 µF 16V
C11,12 ⚠	ECKDRS222MEY	Ceramic	2200 pF
C13	ECKD3D101KBP	Ceramic	100 pF

REF. NO.	PART NO.	DESCRIPTION
C21	EEUFC1A272	Electrolytic 2700 µF 10V
C22,23	EEUFC1A471E	Electrolytic 470 µF 10V
C24	EEUFC1A221E	Electrolytic 220 µF 10V
C25	MCUV1E104KBN	Ceramic 0.1 µF
C30	ECKD3D101KBP	Ceramic 100 pF
L21	YWSL810330	Coil
L22	YWSL675330	Coil
T1 ⚠	G4D2C0000001	Power Transformer
SW1 ⚠	YWSDDFA3	Power Switch
CF1,2 ⚠	YW0R3A333F20	LC Filter
CN1 ⚠	YWB2P3VH	2-pin Connector
F1 ⚠	XBA2C20ET0A	Current Fuse 2A 250V
E1	YWFS916E01A	Wire Assy for Main Board CN700
E2,3 ⚠	K3GE1BB00004	Fuse Holder
E4 ⚠	YW851040	Insulator Cap
E5,6	YWMEP1866	Terminal
E7 ⚠	YW840522	Fuse Insulator Cover
M20 ⚠	YWV2PA1212A3	Insulator
M21	YWA7DA0081A4	Heat Sink
M22	YWV7DA0045A4	Heat Sink
M23	YW2J08	Support
M24	YWV2SA4757A4	Mounting Angle
M25	YWUAMS11V0	Cord Clamp
M26	YWP4050	Tack

ACCESSORY PARTS / PACKAGING PARTS

REF. NO.	PART NO.	DESCRIPTION
M50	YWV2SA1756A3	Rack Mounting Bracket
M51	XSB3+10FN	Binding Head Screws
M52 ⚠	YWV5EA0505B3	Switch Protector
M53 ⚠	YWV8QA5239AN	Operating Instructions
M54	PE26X40C05A	Polyethylene Bag
M55	YWT050803	Polyethylene Bag
M56	YWV8RA1196AN	Printed Matter for VTR Connect
M57	PE55X71C1A	Polyethylene Bag
M58	YWT20X25C03	Polyethylene Bag
M59	YWV8RA1200AN	Printed Matter
M60	YWV9CA4041AN	Packaging Assy
M61	YWV7SA2037A3	Bar Code Label

VIDEO MULTIPLEXER WJ-FS116

MISCELLANEOUS

REF. NO.	PART NO.	DESCRIPTION
E101 ⚠	YWGBSXBS	AC Power Cord Assy for WJ-FS116/B
	YWP242SXGS	AC Power Cord Assy for WJ-FS116/G
CN101 ⚠	YWVAR2	Connector Cover
M1	YWA5RG0141A3	Power Switch Knob
M2 ⚠	YWV5CA0504B2	Card Holder
M3	YWV5WB2535A2	Front Panel
M4	YWV1AA1074A4	Standard Screw
M5	YWV1VA0546A3	LED Lens
M6	YWV2KA1267A1	Front Chassis
M7	YWV6JB1156A3	Button (x 5)
M8	YWV6JA1157A3	Button (x 16)
M9	YWV6JA1156A3	Button
M11	YWV2KB1233A1	Main Chassis
M12	YWV5LA0067A4	Rubber Foot (x 4)
M13	YWA2LA0070A4	Joint for Rubber Foot (x 4)
M14	YWCKT10V0	Cord Clamp
M15 ⚠	YWA7SA0689A4	Earth Mark Label
M16 ⚠	YWV7QA5269A4	Main Label for WJ-FS116/B
	YWV7QA5268A4	Main Label for WJ-FS116/G
M17 ⚠	YWV7MA0473A4	Safety Label for WJ-FS116/G
M18 ⚠	YWV7MB0099A4	Safety Label
M19 ⚠	YWV2PA1190A3	Insulator Sheet
M27	YWCS1	Cord Clamp
M28	YWV5EA2355A1	Upper Cover
M29 ⚠	YWV2PA1211A4	Insulator Sheet
M30	YW0920	Rivet
M31	YWV2SA4742A3	Mounting Angle for Rear Board
M32	YWV5WB2536A2	Rear Panel
M33	JFS2.6SB1WM	Special Screw
M34 ⚠	YWSR5N4	Cord Clamp

FRONT BOARD

REF. NO.	PART NO.	DESCRIPTION
PCB1 (RTL)	JF116EKY1A	Printed Circuit Board Assy
IC2,3	C0JBAF000252	IC
IC5	C0JBAF000252	IC
D1	LN342GP	LED
D2	B3AAA0000380	LED
D4-21	LN1361CTR	LED
R1	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R2	ERJ6GEY0R00	Carbon 0 ohm 1/10W
R8	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R10	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R14	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R16	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R18	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R20	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R22	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R24	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R28	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R30	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R32	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R34	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R36	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R38	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R40	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R42	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R44	ERJ6GEYJ561	Carbon 560 ohms 1/10W
R48-59	ERJ6GEYJ223	Carbon 22K ohms 1/10W
R62-65	ERJ6GEYJ332	Carbon 22K ohms 1/10W
C1	EEVHB0J470R	Electrolytic 47 μF 6.3V
C3,4	MCUN1E104ZFN	Ceramic 0.1 μF
C6	MCUN1E104ZFN	Ceramic 0.1 μF
L1	G1C8R2J00002	Coil
SW1-23	EVQ11A05R	Push Switch
E1	ELY322V513	Wire Assy for Main Board CN304
E2	K1PA14C00001	Wire Assy for Main Board CN303
M10	YWLDS90K	Spacer

D SUB BOARD

REF. NO.	PART NO.	DESCRIPTION
PCB2 (RTL)	JF116EKB1A	Printed Circuit Board Assy
R1-10	ERJ6GEYJ101V	Carbon 100 ohms 1/10W
R12,13	ERJ6GEYJ101V	Carbon 100 ohms 1/10W
R14	ERJ6GEY0R00V	Carbon 0 ohm 1/10W
R15-23	ERJ6GEYJ101V	Carbon 100 ohms 1/10W
C1-10	MCUN1E104ZFN	Ceramic 0.1 μF
C12-23	MCUN1E104ZFN	Ceramic 0.1 μF
L1-10	G1C101J00002	Coil 100 μH
L12,13	G1C101J00002	Coil 100 μH
L14	G1C151J00001	Coil 150 μH
L15-23	G1C101J00002	Coil
L24	G1C151J00001	Coil
CN1	YWJBY25S1A3G	25-pin Connector
CN2	K2HA101B0004	Jack
E1	K1PA12C00001	Wire Assy for Main Board CN301
E2	K1PQ13D00001	Wire Assy for Main Board CN302
E3	K1PA02C00002	Wire Assy for Main Board CN300

BNC BOARD

REF. NO.	PART NO.	DESCRIPTION
PCB3 (RTL)	JF116EKC1A	Printed Circuit Board Assy
R2	D1BD68R00001	Metal 68 ohms
R3	YWR1220Q750D	Metal 75 ohms
R4	YWR1220P122D	Metal 1.2K ohms
CN1	K1QBA3AB0001	Connector
E1	FS116C01A	Wire Assy for Main Board CN717

MAIN BOARD

REF. NO.	PART NO.	DESCRIPTION
PCB4 (RTL)	JF116EKZ1A	Printed Circuit Board Assy
IC300	C0JBAE000016	IC
IC301	YWBR93LC66RF	IC
IC302	YWM380670NET	IC
IC304	YWLH5168N80L	IC
IC306,307	YWMC74AC138M	IC
IC308	C0JBAZ000995	IC
IC309	C0EBH0000063	IC
IC310-312	YWMCHC257E	IC
IC316	74HC374ADTE	IC
IC317	YW74HC08DTE	IC
IC400	C0FBAD000003	IC
IC405	YW74HC04ADTE	IC
IC502	YWN0KZ	LSI
IC503,504	C3ABKG000023	IC
IC506	C0JBAA000097	IC
IC507,508	YWTC4W53FUL	IC
IC603	YWMVT85038	IC
IC604,605	YWTC4W53FUL	IC
IC606	C0JBAA000097	IC
IC700	YWMCHC4053E	IC
IC701706	YWMCHC4051E	IC
IC707	YWNJM2244M	IC
IC708	C0BBBA000023	IC
IC709	YW74HC04ADTE	IC

REF. NO.	PART NO.	DESCRIPTION
IC712	C9ZB00000121	IC
IC715	C0JBAZ000995	IC
IC800	C1ZAZ0001280	IC
IC801	YW6016TC1443	IC
IC802	YWTC7S00FL	IC
IC804	YWNJM2229M	IC
IC805	YW74HC04ADTE	IC
Q300	2SC2412KT46	Transistor
Q301	2SA1037KT47	Transistor
Q302	2SC2412KT46	Transistor
Q303	B1ABGD000010	Transistor
Q305307	YWXN0450100L	Transistor
Q400	2SC2412KT46	Transistor
Q401	2SA1037KT47	Transistor
Q402,403	2SC2412KT46	Transistor
Q405	2SC2412KT46	Transistor
Q406	2SA1037KT47	Transistor
Q425	2SC2412KT46	Transistor
Q500,501	B1CBBF000007	Transistor
Q504	2SC2412KT46	Transistor
Q505,506	2SC2412KT46	Transistor
Q508	2SC2412KT46	Transistor
Q509,510	B1ABGD000010	Transistor
Q603	2SA1037KT47	Transistor
Q700	2SA1037KT47	Transistor
Q701	2SC2412KT46	Transistor
Q702-704	2SC2412KT46	Transistor
Q705	2SA1037KT47	Transistor
Q706	2SC2412KT46	Transistor
Q707-723	2SC3837KT47	Transistor
Q724-726	2SC2412KT46	Transistor
Q727	2SA1037KT47	Transistor
Q728,729	2SA1037KT47	Transistor
Q800	2SC2412KT46	Transistor
D500-503	MA2Z372E0L	Diode
D504	B0ADCC000003	Diode
D700-720	B0ADCC000003	Diode
R70-75	ERJ3GEYJ103	Carbon 10K ohms 1/16W
R76	ERJ3GEYJ122	Carbon 1.2K ohms 1/16W
R77	ERJ3GEYJ103	Carbon 10K ohms 1/16W
R301	ERJ6GEYJ223	Carbon 22K ohms 1/10W
R302	ERJ3GEYJ103	Carbon 10K ohms 1/16W
R304,305	ERJ6GEYJ223	Carbon 22K ohms 1/10W
R308,309	ERJ6GEYJ223	Carbon 22K ohms 1/10W
R311	ERJ6GEYJ102	Carbon 1K ohms 1/10W
R312	ERJ6GEYJ103	Carbon 10K ohms 1/10W
R313	ERJ6GEY0R00	Carbon 0 ohm 1/10W
R316	YWR1220P682D	Metal 6.8K ohms
R317	YWR1220P302D	Metal 3K ohms
R318	ERJ6GEYJ104	Carbon 100K ohms 1/10W
R319	ERJ6GEYJ103	Carbon 10K ohms 1/10W
R320	ERJ6GEY0R00	Carbon 0 ohm 1/10W
R321,322	ERJ6GEYJ221	Carbon 220 ohms 1/10W
R325	ERJ6GEY0R00	Carbon 0 ohm 1/10W
R326	ERJ6GEYJ223	Carbon 22K ohms 1/10W

REF. NO.	PART NO.	DESCRIPTION
R327	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R328	ERJ3GEYJ393	Carbon 39K ohms 1/16W
R329	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R330	ERJ3GEYJ563	Carbon 56K ohms 1/16W
R331	ERJ3GEYJ562	Carbon 5.6K ohms 1/16W
R332	ERJ3GEYJ103	Carbon 10K ohms 1/16W
R333	ERJ3GEYJ153	Carbon 15K ohms 1/16W
R334	ERJ3GEYJ101	Carbon 100 ohms 1/16W
R335	ERJ3GEYJ104	Carbon 100K ohms 1/16W
R336	ERJ3GEYJ564	Carbon 560K ohms 1/16W
R337	ERJ3GEYJ153	Carbon 15K ohms 1/16W
R338	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R339	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R340	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R341	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R344	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R345	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R346	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R347	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R348	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R349	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R350	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R351	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R352	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R353	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R354	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R355	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R356	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R357	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R358	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R359	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R360	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R361	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R362	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R363	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R364	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R365	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R366	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R367	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R368	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R369	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R370	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R371	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R372	ERJ3GEYJ223	Carbon 2K ohms 1/16W
R373	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R374	ERJ3GEYJ223	Carbon 22K ohms 1/16W
R375,376	ERJ3GEYJ102	Carbon 1K ohms 1/16W
R377-394	ERJ3GEYJ121	Carbon 120 ohms 1/16W
R395	ERJ3GEYJ103	Carbon 0K ohms 1/16W
R396	ERJ6GEYJ223	Carbon 22K ohms 1/10W
R400	D0YBR0000007	Carbon 0 ohm1/16W
R416	ERJ3GEYJ222	Carbon 2.2K ohms 1/16W
R417,418	D0YBR0000007	Carbon 0 ohm1/16W
R419	ERJ3GEYJ331	Carbon 330 ohms 1/16W
R422	ERJ3GEYJ222	Carbon 2.2K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R423	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R424	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R425,426	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R427	D0YBR0000007	Carbon	0 ohm 1/16W
R428	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R429	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R430	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R440	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R441	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R442	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R443	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R444	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R445	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R449	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R450,451	YWR0816P102D	Metal	1K ohms 1/16W
R452	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R453	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R477	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R491	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R501	ERJ3GEYJ202	Carbon	2K ohms 1/16W
R502	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R503	ERJ6GEY0R00	Carbon	0 ohm 1/16W
R504	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R505-509	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R510	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R512	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R513	ERJ6GEYJ101	Carbon	100 ohms 1/16W
R514	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R515	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R516,517	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R518	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R519	ERJ3GEYJ105	Carbon	1M ohms 1/16W
R520	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R521	ERJ6GEYJ201	Carbon	200 ohms 1/16W
R522	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R523-529	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R530	ERJ3GEYJ151	Carbon	150 ohms 1/16W
R531	ERJ6GEYJ101	Carbon	100 ohms 1/16W
R532	ERJ3GEYJ151	Carbon	150 ohms 1/16W
R533	ERJ3GEYJ105	Carbon	1M ohms 1/16W
R534	D0YBR0000007	Carbon	0 ohm1/16W
R535	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R536	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R537	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R538	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R539	ERJ3GEYJ105	Carbon	1M ohms 1/16W
R540	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R560	ERJ3GEYJ362	Carbon	3.6K ohms 1/16W
R563	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R564	ERJ3GEYJ152	Carbon	1.5K ohms 1/16W
R566	ERJ3GEYJ272	Carbon	2.7K ohms 1/16W
R567	ERJ3GEYJ122	Carbon	1.2K ohms 1/16W
R568,569	ERJ3GEYJ560	Carbon	56 ohms 1/16W
R570	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R571-573	ERJ3GEYJ223	Carbon	22K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R574-582	YWR0816P242D	Metal	2.4K ohms 1/16W
R583-589	YWR0816P122D	Metal	1.2K ohms 1/16W
R590	ERJ3GEYJ332	Carbon	3.3K ohms 1/16W
R595-599	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R659	ERJ3GEYJ333	Carbon	33K ohms 1/16W
R700	ERJ3GEYJ202	Carbon	2K ohms 1/16W
R701	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R702	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R703	YWR0816P222D	Metal	2.2K ohms 1/16W
R704	YWR0816P102D	Metal	1K ohms 1/16W
R705	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R706	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R707	ERJ3GEYJ392	Carbon	3.9K ohms 1/16W
R708	ERJ3GEYJ331	Carbon	330 ohms 1/16W
R709	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R710	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R711	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R712	ERJ3GEYJ242	Carbon	2.4K ohms 1/16W
R713	ERJ6GEYJ221	Carbon	220 ohms 1/10W
R714	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R715	ERJ6GEYJ561	Carbon	560 ohms 1/10W
R716	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R717	ERJ6GEYJ222	Carbon	2.2K ohms 1/10W
R718	ERJ6GEYJ152	Carbon	1.5K ohms 1/10W
R719	ERJ6GEYJ332	Carbon	3.3K ohms 1/10W
R720	ERJ6GEYJ222	Carbon	2.2K ohms 1/10W
R721	ERJ6GEYJ102	Carbon	1K ohms 1/10W
R722,723	ERJ6GEYJ103	Carbon	10K ohms 1/10W
R724	ERJ6GEYJ104	Carbon	100K ohms 1/10W
R725	ERJ6GEYJ224	Carbon	220K ohms 1/10W
R726	ERJ6GEYJ153	Carbon	15K ohms 1/10W
R727	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R728	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R729	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R730	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R731	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R732	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R733	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R734	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R735	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R736	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R737	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R738	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R739	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R740	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R741	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R742	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R743	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R744	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R745	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R746	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R747	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R748	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R749	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R750	ERJ6GEYJ101	Carbon	100 ohms 1/10W

REF. NO.	PART NO.	DESCRIPTION	
R751	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R752	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R753	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R754	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R755	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R756	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R757	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R758	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R759	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R760	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R761	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R762	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R763	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R764	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R765	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R766	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R767	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R768	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R769	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R770	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R771	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R772	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R773	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R774	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R775	ERJ6GEYJ471	Carbon	470 ohms 1/10W
R776	ERJ6GEYJ223	Carbon	22K ohms 1/10W
R777	ERJ6GEYJ101	Carbon	100 ohms 1/10W
R778-794	YWR1220Q750D	Metal	75 ohms
R795	ERJ6GEYJ273	Carbon	27K ohms 1/10W
R796	ERJ6GEYJ473	Carbon	47K ohms 1/10W
R797	ERJ6GEYJ103	Carbon	10K ohms 1/10W
R798	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R799	ERJ3GEYJ123	Carbon	12K ohms 1/16W
R801	D0YBR0000007	Carbon	0 ohm 1/16W
R802	ERJ3GEYJ154	Carbon	150K ohms 1/16W
R803	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R804	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R807	D0YBR0000007	Carbon	0 ohm 1/16W
R808	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R809	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R810	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R811	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R812	ERJ3GEYJ391	Carbon	390 ohms 1/16W
R813	ERJ3GEYJ152	Carbon	1.5K ohms 1/16W
R814	ERJ3GEYJ474	Carbon	470K ohms 1/16W
R815-817	ERJ3GEYJ222	Carbon	2.2K ohms 1/16W
R818	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R819,820	ERJ3GEYJ362	Carbon	3.6K ohms 1/16W
R822	ERJ3GEYJ103	Carbon	10K ohms 1/16W
R823,824	ERJ3GEYJ221	Carbon	220 ohms 1/16W
R825	YWR0816R134D	Metal	130K ohms 1/16W
R826	YWR0816P183D	Metal	18K ohms 1/16W
R827	ERJ3GEYJ363	Carbon	36K ohms 1/16W
R828	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R829,830	ERJ3GEYJ102	Carbon	1K ohms 1/16W

REF. NO.	PART NO.	DESCRIPTION	
R831	ERJ6GEYJ222	Carbon	2.2K ohms 1/10W
R833	D0YBR0000007	Carbon	0 ohm1/16W
R836-843	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R901	ERJ3GEYJ752	Carbon	7.5K ohms 1/16W
R902,903	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R904	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R905	ERJ3GEYJ154	Carbon	150K ohms 1/16W
R906	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R907	ERJ3GEYJ102	Carbon	1K ohms 1/16W
R908	ERJ3GEYJ153	Carbon	15K ohms 1/16W
R909,910	D0YBR0000007	Carbon	0 ohm 1/16W
R913	ERJ3GEYJ472	Carbon	4.7K ohms 1/16W
R914	ERJ3GEYJ682	Carbon	6.8K ohms 1/16W
R915	ERJ3GEYJ271	Carbon	270 ohms 1/16W
R916,927	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R928	ERJ3GEYJ393	Carbon	39K ohms 1/16W
R929	ERJ3GEYJ223	Carbon	22K ohms 1/16W
R930	ERJ3GEYJ101	Carbon	100 ohms 1/16W
R931	D0YBR0000007	Carbon	0 ohm1/16W
R939	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R942-946	ERJ6GEY0R00	Carbon	0 ohm 1/10W
R949	ERJ6GEYJ222	Carbon	2.2K ohms 1/10W
R950	ERJ6GEYJ102	Carbon	1K ohms 1/10W
R952	D0YBR0000007	Carbon	0 ohm 1/16W
R954	D0YBR0000007	Carbon	0 ohm 1/16W
R956	D0YBR0000007	Carbon	0 ohm 1/16W
VR400	EVM1DSW30B13	Variable Resistor	1K ohms
VR404	EVM1DSW30B13	Variable Resistor	1K ohms
VR501	EVM1DSW30B13	Variable Resistor	1K ohms
C300,301	F1J1E104A044	Ceramic	0.1 µF
C306	F1J1E104A044	Ceramic	0.1 µF
C307	F1J1C105A004	Ceramic	1 µF
C308,309	YF400300CHJT	Ceramic	30 pF
C310	F1J1E104A044	Ceramic	0.1 µF
C311	EEVHB0J101P	Electrolytic	100 µF 6.3V
C312-314	F1J1E104A044	Ceramic	0.1 µF
C317	F1J1E104A044	Ceramic	0.1 µF
C318	YF400223XKT	Ceramic	0.022 µF
C319	F1H1H103A013	Ceramic	0.01 µF
C321	F1H1A105A004	Ceramic	1 µF
C322	MCUV1E104ZFV	Ceramic	0.1 µF
C323	F1H1A105A004	Ceramic	1 µF
C324,325	F1H1H103A013	Ceramic	0.01 µF
C327-342	F1H1H103A013	Ceramic	0.01 µF
C343-345	F1J1E104A044	Ceramic	0.1 µF
C346	EEVHB0J101P	Electrolytic	100 µF 6.3V
C350	MCUV1E104ZFV	Ceramic	0.1 µF
C400	MCUV1E104ZFV	Ceramic	0.1 µF
C402	MCUV1E104ZFV	Ceramic	0.1 µF
C404,405	MCUV1E104ZFV	Ceramic	0.1 µF
C413	EEVHB0J101P	Electrolytic	100 µF 6.3V
C414	F1J1C105A004	Ceramic	1 µF
C415	MCUV1E104ZFV	Ceramic	0.1 µF
C419	EEVHB0J101P	Electrolytic	100 µF 6.3V
C420	F1H1H560A004	Ceramic	56 pF

REF. NO.	PART NO.	DESCRIPTION	
C423	F1H1H510A231	Ceramic	51 pF
C424	F1J1H330A410	Ceramic	33 pF
C425	F1H1H220A004	Ceramic	22 pF
C455	MCUV1E104ZFV	Ceramic	0.1 µF
C500	F1J1E104A044	Ceramic	0.1 µF
C501	F1H1C104A001	Ceramic	0.1 µF
C502	F1H1H222A013	Ceramic	2200 pF
C503	F1H1H331A650	Ceramic	330 pF
C504,505	F1H1H100A017	Ceramic	10 pF
C506,507	F1H1H331A650	Ceramic	330 pF
C508	MCUV1E104ZFV	Ceramic	0.1 µF
C509	YW6CV1000GX	Electrolytic	100 µF 6.3V
C510	F1J1E104A044	Ceramic	0.1 µF
C511	F2H0J3310003	Electrolytic	330 µF 6.3V
C512-514	F1J1E104A044	Ceramic	0.1 µF
C515	F1H1H8R0A226	Ceramic	8 pF
C516	F1H1H331A650	Ceramic	330 pF
C518	F1H1H221A004	Ceramic	220 pF
C519	F1J1E104A044	Ceramic	0.1 µF
C520	F1J1C105A004	Ceramic	1 µF
C521	F1H1H331A650	Ceramic	330 pF
C522	F1H1H5R00001	Ceramic	5 pF
C523	F1H1H331A650	Ceramic	330 pF
C525	F1H1H300A004	Ceramic	30 pF
C526	F1H1H331A650	Ceramic	330 pF
C537	EEVHB0J101P	Electrolytic	100 µF 6.3V
C528	F1J1E104A044	Ceramic	0.1 µF
C529-531	F1J1E104A044	Ceramic	0.1 µF
C534,535	F1J1E104A044	Ceramic	0.1 µF
C540	F1H1H101A004	Ceramic	100 pF
C542	MCUV1E104ZFV	Ceramic	0.1 µF
C544	EEVHB0J101P	Electrolytic	100 µF 6.3V
C546	F1J1E104A044	Ceramic	0.1 µF
C547	EEVHB0J101P	Electrolytic	100 µF 6.3V
C548	F1J1E104A044	Ceramic	0.1 µF
C549	EEVHB0J221P	Electrolytic	220 pF 6.3V
C551,552	F1J1E104A044	Ceramic	0.1 µF
C553	F1H1E333A002	Ceramic	0.033 µF
C554	F1H1H222A013	Ceramic	2200 pF
C555	F1H1A105A004	Ceramic	1 µF
C613	F1H1E104A016	Ceramic	0.1 µF
C614	F1J1E104A044	Ceramic	0.1 µF
C615	F1H1E104A016	Ceramic	0.1 µF
C617	EEVHB0J101P	Electrolytic	100 µF 6.3V
C618-624	F1H1E104A016	Ceramic	0.1 µF
C630	F1H1E104A016	Ceramic	0.1 µF
C632-634	F1J1E104A044	Ceramic	0.1 µF
C635	F1H1H331A650	Ceramic	330 pF
C636	F1H1A105A004	Ceramic	1 µF
C700-702	F1J1E104A044	Ceramic	0.1 µF
C703	EEVHB0J101P	Electrolytic	100 µF 6.3V
C704-706	F1J1E104A044	Ceramic	0.1 µF
C707	EEVHB0J101P	Electrolytic	100 µF 6.3V
C708	YW6CV1000GX	Electrolytic	100 µF 6.3V
C709-712	F1J1E104A044	Ceramic	0.1 µF

REF. NO.	PART NO.	DESCRIPTION	
C713	EEVHB0J101P	Electrolytic	100 µF 6.3V
C714	YW6CV1000GX	Electrolytic	100 µF 6.3V
C715-718	F1J1E104A044	Ceramic	0.1 µF
C719	EEVHB0J221P	Electrolytic	220 pF 6.3V
C722	MCUV1E104ZFV	Ceramic	0.1 µF
C727-729	F1J1E104A044	Ceramic	0.1 µF
C724	ECUV1H103KBN	Ceramic	0.01 µF
C725	EEVHB0J101P	Electrolytic	100 µF 6.3V
C726	YF400563XKT	Ceramic	0.056 µF
C730	EEVHB0J101P	Electrolytic	100 µF 6.3V
C731	F1J1E104A044	Ceramic	0.1 µF
C732	EEVHB0J101P	Electrolytic	100 µF 6.3V
C733	F1J1E104A044	Ceramic	0.1 µ
C734	EEVHB0J101P	Electrolytic	100 µF 6.3V
C735	F1J1E104A044	Ceramic	0.1 µF
C736	EEVHB0J101P	Electrolytic	100 µF 6.3V
C737	F1J1E104A044	Ceramic	0.1 µF
C738	EEVHB0J101P	Electrolytic	100 µF 6.3V
C739	F1J1E104A044	Ceramic	0.1 µF
C740	EEVHB0J101P	Electrolytic	100 µF 6.3V
C741	F1J1E104A044	Ceramic	0.1 µF
C742	EEVHB0J101P	Electrolytic	100 µF 6.3V
C743	F1J1E104A044	Ceramic	0.1 µF
C744	EEVHB0J101P	Electrolytic	100 µF 6.3V
C745	F1J1E104A044	Ceramic	0.1 µF
C746	EEVHB0J101P	Electrolytic	100 µF 6.3V
C747	F1J1E104A044	Ceramic	0.1 µF
C748	EEVHB0J101P	Electrolytic	100 µF 6.3V
C749	F1J1E104A044	Ceramic	0.1 µF
C750	EEVHB0J101P	Electrolytic	100 µF 6.3V
C751	F1J1E104A044	Ceramic	0.1 µF
C752	EEVHB0J101P	Electrolytic	100 µF 6.3V
C753	F1J1E104A044	Ceramic	0.1 µF
C754	EEVHB0J101P	Electrolytic	100 µF 6.3V
C755	F1J1E104A044	Ceramic	0.1 µF
C756	EEVHB0J101P	Electrolytic	100 µF 6.3V
C757	F1J1E104A044	Ceramic	0.1 µF
C758	EEVHB0J101P	Electrolytic	100 µF 6.3V
C759	F1J1E104A044	Ceramic	0.1 µF
C760	EEVHB0J101P	Electrolytic	100 µF 6.3V
C761	EEVHB0J221P	Electrolytic	220 µF6.3V
C762	F1J1E104A044	Ceramic	0.1 µF
C763,764	EEVHB0J101P	Electrolytic	100 µF 6.3V
C765	F1J1E104A044	Ceramic	0.1 µF
C766	EEVHB0J221P	Electrolytic	220 µF6.3V
C767	F1H1H180A004	Ceramic	18 pF
C768	F1H1C5630001	Ceramic	0.056 µF
C769	MCUV1E104ZFV	Ceramic	0.1 µF
C771	F1H1H101A004	Ceramic	100 pF
C772	F1H1A105A004	Ceramic	1 µF
C773	F1H1H331A650	Ceramic	330 pF
C774	F1H1H102A004	Ceramic	1000 pF
C775	F1H1A105A004	Ceramic	1 µF
C776	MCUV1E104ZFV	Ceramic	0.1 µF
C777	F1H1H300A004	Ceramic	30 pF

REF. NO.	PART NO.	DESCRIPTION	
C778	F1H1H180A004	Ceramic	18 pF
C786,787	YW6CV1000GX	Electrolytic	100 μF 6.3V
C788	F1J1E104A044	Ceramic	0.1 μF
C789	EEVHB0J101P	Electrolytic	100 μF 6.3V
C805	EEVHB0J221P	Electrolytic	220 μF 6.3V
C811	F1H1A105A004	Ceramic	1 μF
C812	F1H1H331A650	Ceramic	330 pF
C813	F1H1H221A004	Ceramic	220 pF
C814	MCUV1E104ZFV	Ceramic	0.1 μF
C815	F1H1H332A013	Ceramic	3300 pF
C816	F1H1H152A013	Ceramic	500 pF
C817	F1H1A105A004	Ceramic	1 μF
C818	MCUV1H470JCV	Ceramic	47 pF
C819	F1H1H102A004	Ceramic	1000 pF
C820	MCUV1E104ZFV	Ceramic	0.1 μF
C821	F1H1H391A004	Ceramic	39 pF
C822	F1H1H3610001	Ceramic	360 pF
C826	MCUV1E104ZFV	Ceramic	0.1 μF
C827	F1H1H391A004	Ceramic	39 pF
C828	F1H1H102A004	Ceramic	1000 pF
C829	MCUV1E104ZFV	Ceramic	0.1 μF
C841	F1J1E104A044	Ceramic	0.1 μF
C842	F1J1H101A442	Ceramic	100 pF
C843	F1J1C105A004	Ceramic	1 μF 16V
CT500,700	ECRJA020E11W	Trimmer	
L300,303	G1C8R2J00002	Coil	8.2 μH
L400	G1C100J00001	Coil	10 μH
L401	G1C220J00001	Coil	22 μH
L500	EIC4EJ011E	Coil	
L502	G1C8R2J00002	Coil	8.2 μH
L505	G1C8R2J00002	Coil	8.2 μH
L506	G1C8R2J00002	Coil	8.2 μH
L507,508	G1C5R6J00001	Coil	5.6 μH
L600	G1C8R2J00002	Coil	8.2 μH
L700	G1C8R2J00002	Coil	8.2 μH
L701-705	G1C8R2J00002	Coil	8.2 μH
L708,709	G1C5R6J00001	Coil	5.6 μH
L710	G1C330J00002	Coil	33 μH
L711,712	G1C8R2J00002	Coil	8.2 μH
SW300	ESD11V120	Slide Switch	
X300	YWCSA7.37MTZ	Oscillator	
X500	H0J270500003	Crystal Oscillator	
X501	H0J177500007	Crystal Oscillator	
X800	YFCSB503F2	Crystal Oscillator	
CN300	YW530140210	8-pin Connector	
CN301	YW530141210	12-pin Connector	
CN302	YW530141310	13-pin Connector	
CN303	K1KA14A00025	14-pin Connector	
CN304	YW530141310	13-pin Connector	
CN700	K1KA05A00082	5-pin Connector	
CN701-716	K1QBB2CB0003	Connector	
CN717	YWB6BPHKS	6-pin Connector	
BZ300	PKM22EPP4002	Buzzer	
E301-306	YWMEP1866	Terminal	
TP305	YWRCT2125TPV	Test-pin	

REF. NO.	PART NO.	DESCRIPTION
POWER BOARD		
Refer to Replacement Parts List for WJ-FS109 on Page 22.		
ACCESSORY PARTS / PACKAGING PARTS		
M50	YWV2SA1756A3	Rack Mounting Bracket
M51	XSB3+10FN	Binding Head Screws
M52 ⚠	YWV5EA0505B3	Switch Protector
M53 ⚠	YWV8QA5239AN	Operating Instructions
M54	PE26X40C05A	Polyethylene Bag
M55	YWT050803	Polyethylene Bag
M56	YWV8RA1196AN	Printed Matter for VTR Connect
M57	PE55X71C1A	Polyethylene Bag
M58	YWT20X25C03	Polyethylene Bag
M59	YWV8RA1200AN	Printed Matter
M60	YWV9CA4040AN	Packaging Assy
M61	YWV7SA2037A3	Bar Code Label